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TWO DECADES OF CHANGE IN ALABAMA'S POPULATION: 1960-1970 and 1970-1980

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Abstract—Significant alterations have occurred in Alabama's population over the last two decades. The State's population, in excess of 3.8 million as of the 1980 census, grew at approximately twice the rate during the 1970s as during the 1960s. Population growth was characteristic of all seven of the State's major geographic regions and all eight Metropolitan Statistical Areas, with greatest growth generally occurring in the northern portion of the State and along the Gulf Coast. Non-whites, while experiencing a declining population during the 1960s, achieved a substantial gain during the 1970s as growth in that sector nearly matched that occurring among whites. Birth rates for both whites and non-whites have declined significantly over the last two decades, while crude death rates have increased slightly for whites but remained essentially unchanged among non-whites. The most dramatic change in the State's population, however, has involved migration—particularly changing migration tendencies among the non-white segment. Non-whites were leaving the State in large numbers during the 1960s, but only a very slight net migration loss occurred during the 1970s. Whether the growth of the 1970s continues is largely contingent on the State's economic situation. Migration into the State will undoubtedly be curtailed, for example, without significant improvement in the employment sector.

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Note—At the time the data for this report were compiled, the latest census reports available from the 1980 census were utilized. Subsequent adjustments and releases of data by the Bureau of the Census have resulted in minor changes in population totals for some Alabama counties. These alterations, however, do not affect the basic demographic trends, generalizations, etc., cited herein.

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FIGURE I
ALABAMA REGIONS AND COUNTIES

Two Decades of Change in Alabama's Population: 1960-1970 and 1970-1980

I. Introduction

Major changes have occurred in the size, distribution and character of Alabama's demographic portrait during the 1970s. There were at least eight significant outcomes of population dynamics in the previous decade.

- The State's population increased 12.9 percent. For the same period, the United States increased its numbers by 11.4 percent.
- The State's seven regions and eight Metropolitan Statistical Areas, with one exception each, experienced more rapid rates of increase during the 1970s than in the 1960s.
- Metropolitan and nonmetropolitan counties increased by 13.3 and 12.4 percent, respectively. Comparable increases for the United States as a whole were 9.8 and 15.8 percent.
- Over the past twenty years, the difference in the growth rates of metropolitan and nonmetropolitan counties has been dramatically reduced.
- Whites and non-whites contributed about the same share to the State's overall growth. Whites increased by 13.3 percent and non-whites by 12.1.
- Growth rates among whites were substantially higher in nonmetropolitan counties than those for non-whites. Non-white population growth in metropolitan counties, however, slightly outpaced white growth.
- The net migration rate for the State changed from a net loss during the 1960s to a net gain during the 1970s.
- Net migration became the major factor in the explanation of population increases among whites. Non-whites, on the other hand, moved from a substantial net migration loss during the 1960s to a much smaller rate of loss during the 1970s.

The report is designed to provide information regarding frequently asked questions about Alabama's population. The data are described at four levels of aggregation. First, the rate of change of the State's regions (see Figure 1),[1] counties, and Metropolitan Statistical Areas is analyzed for the past two decades. A second area of inquiry focuses on fertility, mortality, and migration rates. Each of these two is, in turn, analyzed by race.

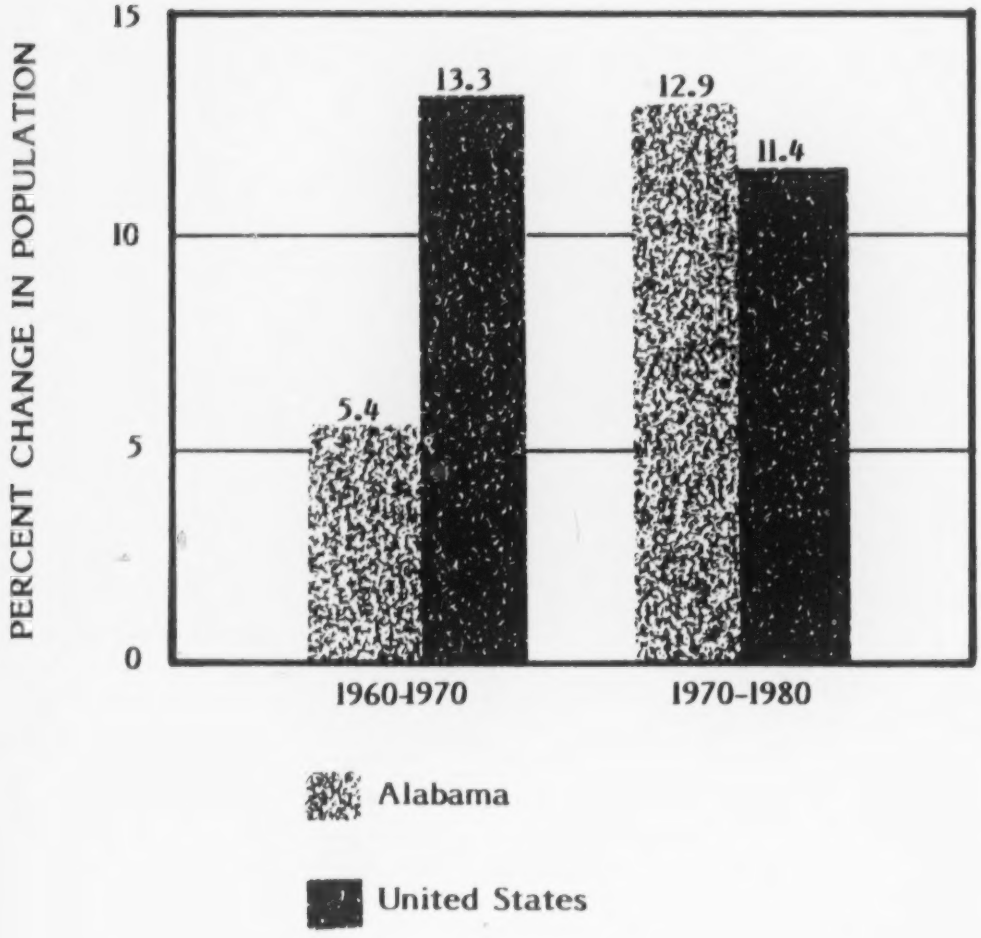
II. Overview of Population Changes: 1960-1980

Alabama's population grew over twice as fast during the 1970s as during the 1960s (Table I). For the earlier period, an annual average of 5.4 persons per thousand population were added to the State's population while during the latter the growth rate had increased to 12.9. The numerical increase totaled approximately 446,000 persons during the 1970s, but only about 177,000 during the 1960s. (See Figure 2.)

As expected, not all regions of the State experienced equal rates of growth. The highest rates of increase during the 1970s were generally recorded in the northern half of the State and along the Gulf Coast, while the lowest growth rates were concentrated in the Black Belt and Central Coastal Plain-Wire Grass areas. All regions of the State, with the exception of the Tennessee Valley-Sand Mountain area, achieved higher rates of growth during the 1970s than in the 1960s. Increased rates of growth ranged from twice as high (Central Coastal Plain-Wire Grass) to almost five times as high (Gulf Coast), while the Black Belt moved from a moderate net loss during the earlier decade to a moderate net gain during the latter.

FIGURE 2

PERCENT CHANGE IN POPULATION
1960-70 AND 1970-80,
ALABAMA AND THE UNITED STATES



Almost all Alabama counties experienced population increases during the 1970s. The only exceptions were six Black Belt counties and two Central Coastal Plain-Wire Grass counties. Fifty-nine of the State's sixty-seven counties, therefore, registered population gains. Between 1960 and 1970, however, population declines were recorded in almost half (i.e., thirty-two) of Alabama's counties, including every county in the Black Belt.

III. Gross Population Change—Regions, Counties and Metropolitan Statistical Areas

A. Regions and Counties

1. **Upper Coastal Plain.** The most rapidly growing region in Alabama during the 1970s was the Upper Coastal Plain. (See Table 1 for all data pertaining to Section III.) Population growth occurred over three times faster during the 1970s than in the 1960s, with the region adding 20.2 persons per thousand population annually during the last decade. All ten Upper Coastal Plain counties gained population, most at substantial rates. All but one county (Pickens) posted average annual growth rates in excess of 10.0, and all except three (Bibb, Lamar, and Pickens) achieved growth rates of 15.0 or more. Three counties in the area—Autauga, Elmore, and Marion—were among the most rapidly growing counties in the State during this period, with all adding in excess of 25.0 persons annually per thousand population.

Only three Upper Coastal Plain counties lost population during the 1960s and these three all experienced moderate to heavy gains during the 1970s. Pickens County, with a relatively high proportion of non-whites, moved from a loss of 7.1 persons per thousand population annually to a gain of 5.7, while Bibb and Chilton counties made the transition from slight losses (3.8 and 2.0, respectively) to substantial gains (13.8 and 21.6). All other counties showed considerably higher rates of gain during the latter decade than the former except Autauga. This county's average annual rate of growth (i.e., at approximately 30.0) remained essentially unchanged over the two time periods.

2. **Gulf Coast.** The second most rapidly growing area of the State during the 1970s was the Gulf Coast. This region's growth rate has increased approximately five-fold over the two decades, and during the last ten years all three counties within the area have exhibited fairly sizable rates of increase. The largest gain during the 1970s, however, occurred in Baldwin County. Approximately 32.0 persons per thousand population annually were added, making this county one of the fastest growing in the State. Growth rates recorded for Mobile and Escambia counties amounted to only about one-half and one-third of that registered in Baldwin.

Although Baldwin County experienced high average annual growth rates during both decades (i.e., 21.0 and 32.1), Escambia and Mobile counties grew only slightly during the 1960s. While the growth rate for Baldwin County increased by a factor of 1.5 between the 1960s and the 1970s, however, Escambia's rate of growth was 2.4 times greater, and Mobile's a huge 14.8.

3. **Piedmont, Tennessee Valley-Sand Mountain, and Upper Coosa Basin.** These three regions of the State experienced population increases during the 1970s very close to that registered for the State as a whole. The Piedmont and Tennessee Valley-Sand Mountain regions were slightly above the State average (with average annual growth rates of 15.1 and 14.2) while the Upper Coosa Basin grew at slightly below the state average (at 12.2).

a. **The Piedmont.** This region, from the standpoint of land area, is the second smallest of the regional delineations utilized in the present analysis. Only seven counties are considered to be a part of this area, none of which are classified as "metropolitan." The area's largest cities include Auburn-Opelika (a combined population of 50,367 in 1980) and Alexander City (13,807).

The growth rate recorded in this region during the 1970s was approximately 3.4 times greater than that which occurred during the 1960s (i.e., 15.1 versus 4.5). All seven counties showed higher growth rates during the most recent decade than in the earlier, when

either slight to substantial increases (three counties) or slight to moderate decreases (four counties) were observed.

Lee was the region's most rapidly growing county during both decades. Approximately 24.0 persons were added annually per thousand population during each period. This county, which is the site of Auburn University, attracted a large influx of younger persons during the 1960s and 1970s, some of which were engaged in the family formation process adding still further to population increase. The average annual growth rate in two other counties (Cleburne and Tallapoosa) was in excess of 14.0 during the 1970s, with the others ranging from 6.7 to 9.5.

b. **Tennessee Valley-Sand Mountain.** Population growth in this region was actually less during the 1970s than in the 1960s. During the earlier period, the average annual growth rate was approximately 24.0 but during the latter it had dropped to 14.2 (a decrease of 41.0 percent). A major reason for the reduction traces to the out-migration that occurred in Madison County (and Huntsville) after funding cuts in various NASA programs. While an annual average of 59.0 persons per thousand were added to this county during the 1960s (a period of rapid development in the space industry), the growth rate was only 5.6 during the 1970s.

Of the three other counties showing lower growth rates during the 1970s than in the 1960s (Lawrence, Limestone, and Morgan), two are contiguous to Madison (Limestone and Morgan). Presumably, this pattern reflects, at least in part, the slowdown in growth associated with Madison County. Although a scant majority of these northern Alabama counties (i.e., five of nine) showed increased rates of growth between the 1960s and 1970s, substantially higher growth rates were characteristic of Jackson (Scottsboro) and DeKalb (Ft. Payne)—both located in the extreme northeastern part of the State.

While all counties in this region gained population during the 1970s, actual growth rates varied considerably. All, however, had average annual growth rates in excess of 10.0 except Colbert (at 9.8) and Madison (5.6). Jackson, DeKalb, and Marshall, the region's most rapidly growing counties, all achieved average annual growth rates in excess of 20.0.

c. **Upper Coosa Basin.** This region contains the largest Metropolitan Statistical Area in the State (the Birmingham MSA, encompassing Jefferson, St. Clair, Shelby, and Walker counties), along with two other metropolitan centers (Anniston and Gadsden, including Calhoun and Etowah counties). Six of the eleven counties located in this area, therefore, are defined by the Bureau of the Census as "metropolitan" in character.

Overall, the growth rate has increased approximately fourfold in the Upper Coosa Basin over the last two decades. An annual average growth rate of only 3.1 was posted during the 1960s, while the rate increased to 12.2 during the 1970s. In addition, all counties lying within the region either experienced increased rates of growth over the two time periods, or moved from losses to gains. For many of these counties, the growth rate during the most recent decade was several times greater than that which occured during the 1960s (e.g., Blount, St. Clair, Shelby, Walker, etc.).

The three most rapidly growing counties in the State during the 1970s are found in this area—Shelby (adding a phenomenal 74.3 persons per thousand population annually), St. Clair (increasing by 47.4) and Blount (adding 35.8). Winston County also increased at a pace (i.e., a growth rate of 31.8) which places it among the State's leading gainers. Although all counties within the region experienced gains during the most recent decade, Cherokee, Etowah, and Talladega had slight to moderate declines during the 1960s.

The area's most rapidly growing counties during the 1970s (i.e., Shelby, St. Clair, and Blount) are all contiguous to Jefferson County (Birmingham). In addition, Walker County—also adjacent to Jefferson—increased very rapidly. This pattern undoubtedly reflects a continuing tendency for intra-city residents to move away from the urban core and for new residents to settle in locales somewhat removed from the central city. The data revealed, for

example, that the rate of increase for Jefferson County during the 1970s (at 4.1) was the lowest recorded for any county in this region. The trend toward suburbanization of Alabama's central city residents reflects population redistribution patterns which also hold for the United States generally. Such trends were set in motion much earlier in the 20th century, but reached their greatest level of visibility in most American cities during the 1950s and 1960s.[2]

4. **Central Coastal Plain-Wire Grass.** Most of the counties (eleven of sixteen) located in this region were marked by population declines during the 1960s. Overall, however, the area was still able to register an average annual growth rate of 4.0. This pattern is largely accounted for by the huge gain (a growth rate of 70.4) occurring in Dale County. Fort Rucker, a massive helicopter pilot training center, is located in this county, and the huge troop build-up associated with the Vietnamese conflict was responsible for bringing several thousand new residents into the county.

During the 1970s, however, only two counties—Butler and Dale—recorded population losses. The overall growth rate doubled (8.1 vis-a-vis only 4.0) and Houston County (Dothan) emerged as the area's fastest growing county, as well as one of the most rapidly growing in the State. This county, for example, gained at an average annual rate of 31.9 during the 1970s, approximately a three-fold increase over that recorded during the 1960s. Butler was the only county to lose population during both time periods, although the rate of loss was cut substantially during the most recent decade. Most of the other counties have shown either increased rates of growth over the last twenty years (e.g., Houston) or a change from declining numbers to population gains (several counties).

The Central Coastal Plain-Wire Grass counties with the highest rates of increase during the 1970s were generally contiguous or in close proximity to Houston County (e.g., Coffee, Geneva, and Henry counties). This indicates, in part, the growing influence of Dothan as a regional service and distribution center. Growth rates in the westernmost counties (e.g., Choctaw, Clark, and Washington), however, were much more restrained.

Russell County, part of the Columbus, Georgia, Metropolitan Statistical Area, gained only about 4.0 persons per thousand population annually during the 1970s, while the rate of loss in Dale County—the region's (and State's) largest population gainer during the 1960s—was nearly 10.0. Pike County, the location of Troy and the site of Troy State University, also showed substantial population change (from a rate of loss of 3.7 during the 1960s to a gain of 12.0 during the 1970s). As in the case for Lee County, the in-migration of college bound youth undoubtedly explains much of the variation.

5. **Black Belt.** The Black Belt was the slowest growing region in Alabama during the 1970s. Still, however, the population increased at a rate approximately 60.0 percent of that for the entire State. Nearly 8.0 persons were added per thousand population annually during this period (12.9 for the State as a whole), with close to a majority of these counties (i.e., five of eleven) showing gains.

This pattern, however, represents considerable deviation from that which characterized the 1960s. During that period, the Black Belt was losing numbers at an average annual rate of approximately 7.0. It was the only region of the State experiencing a declining population, and all counties within the region were registering population decreases (most by substantial margins). During the 1970s, however, regional growth approached the State average, and for all counties (except Dallas) rates of loss were either reduced or there was a transition from losses to gains. In Dallas County, however, the rate of growth remained stationary over the two time periods.

The most substantial Black Belt gains by far during the 1970s were concentrated in Montgomery County (a growth rate slightly in excess of 17.0). Macon County also experienced a moderate rate of increase, as did Marengo, Greene, and Lowndes counties Significant losses, reflecting the pattern of the 1960s, were still the rule, however, in Bullock and Wilcox counties.

B. Metropolitan Statistical Areas

Since the early part of the 20th century the Bureau of the Census has provided various conceptual tools for use in the population analysis of the nation's larger towns and urban centers. In 1910, the term "Metropolitan District" was used to delineate major urban concentrations. After various alterations in definition, "Standard Metropolitan Area" was adopted for the 1950 census, while "Standard Metropolitan Statistical Area" was utilized in 1960 and 1970. Beginning this year, however, reflecting further redefinitions, the nomenclature has become "Metropolitan Statistical Area" (MSA), and metropolitan areas henceforth will be classified according to population size into one of four main categories or "levels."[3]

To qualify as a MSA, an area (i.e., county or counties) must have a central city of at least 50,000 population within its corporate limits, or an urbanized area of at least 50,000, *and* a total Metropolitan Statistical Area population of at least 100,000. Contiguous counties are included in MSA designation if certain requirements pertaining to social and economic integration with the central city are satisfied.[4] As of the 1980 census, eight such areas were so designated in Alabama, involving seventeen counties. In addition, Russell County (Phenix City) is included in the Columbus, Georgia MSA, bringing the total number of metropolitan counties lying within the State to eighteen.

Alabama's metropolitan counties grew slightly faster than nonmetropolitan counties, as well as a little faster than the State as a whole, during the 1970s. A higher growth rate for the State's largest urban centers also held during the 1960s, except in this instance metropolitan counties increased at better than twice the pace of nonmetropolitan counties.

Although the rate of population growth has increased substantially for both categories of counties over the last two decades, the magnitude of the increase was much greater for nonmetropolitan than metropolitan counties. While nonmetropolitan counties, therefore, achieved better than a fourfold increase in rate of growth (from 2.8 to 12.4), metropolitan counties approximately doubled (from 7.1 to 13.3). Nonmetropolitan growth in Alabama over the last twenty years has followed a pattern similar to that observed for the U.S. as a whole (an increase of 4.0 percent for the U.S. during the 1960s as opposed to 15.8 percent during the 1970s). While Alabama's rate of metropolitan growth has also increased dramatically, however, that for the U.S. has been cut by approximately one-half (from 17.0 percent to 9.8).[5]

The most rapidly growing MSA in the State during the 1970s, with an average annual growth rate of approximately 21.0, was Montgomery. Trailing only slightly behind were the Tuscaloosa and Mobile MSAs (adding 18.5 and 17.6 per thousand population annually). In addition, three of the remaining five (Florence, Anniston, and Birmingham) had growth rates in excess of 10.0.

All metropolitan areas except Huntsville either experienced an increased rate of growth, or moved from a slight loss to a moderate gain between the 1960s and 1970s. Accelerating growth rates were particularly characteristic of the Montgomery and Mobile MSAs. The Huntsville MSA, which registered heavy population gains during the 1960s, experienced only moderate growth during the 1970s. The Gadsden MSA and Russell County (Columbus, Georgia MSA), however, both moved from population losses to increases.

Of metropolitan counties containing central cities (i.e., the urban center responsible for MSA designation), Tuscaloosa and Lauderdale (Florence), with growth rates of 18.5 and 18.2, increased at the fastest pace during the 1970s. Montgomery, Mobile, and Calhoun (Anniston) also showed substantial rates of increase. Jefferson County, however, the State's most populous county and the site of Alabama's largest city, added only about 4.0 persons annually per thousand population.

Of noncentral city, metropolitan counties, the highest rates of increase occurred in those contiguous to Jefferson. Shelby, St. Clair, and Walker, for example, all recorded impressive growth rates. In addition, metropolitan counties

contiguous to Montgomery (i.e., Autauga and Elmore), Huntsville (Limestone and Marshall), and Mobile (Baldwin) also exhibited a similar pattern.

Compared with the 1960s, significantly higher levels of growth during the 1970s were the rule for Shelby, St. Clair, and Walker counties (all, as noted, surrounding Birmingham and Jefferson County) and Elmore County (lying within the Montgomery MSA). All experienced increased rates of growth ranging from three times greater (Elmore County) to approximately six times greater (Walker County). In these cases, heavy movement from the central city to the suburbs (commonly referred to as "urban spillover") and the tendency for new residents to establish domiciles in outlying communities probably account for much of the increase.

IV. Population Changes According to Race

Both major segments of Alabama's population—white and non-white—grew at approximately the same level during the 1970s. Whites increased at a rate of 13.3 persons per thousand population annually, while the non-white growth rate was 12.1. The net gain for whites, therefore, was only 1.2 persons greater per thousand population than that for non-whites. (See Table 2 for all data pertaining to this section.)

While the white growth rate has varied little over the last two decades (11.0 vis-a-vis 13.3), just the opposite has been the case for non-whites. A moderate net loss was characteristic of this group during the 1960s (an average annual rate of decline of 7.4), but a substantial increase (i.e., 12.1) occurred during the 1970s. (See Figure 3.)

The spectre of non-white population gains represents considerable deviation from past trends. Prior to the 1970s, Alabama's non-white population—and that throughout the South generally—had been characterized by heavy net migration losses as blacks journeyed to the urban, industrial centers of the Northeast, Midwest, and West in search of better economic opportunities.[6] With the dawn of the 1970s, however, the number leaving and the number returning became much more evenly balanced;[7] and, by the late 1970s, more non-whites (by almost a two-to-one margin) were entering the South than the number leaving.[8] Although Alabama was still experiencing slight net migration losses among non-whites during the 1970s, the rate of decline had been greatly curtailed. (A detailed discussion of these trends is presented in Section VI of this report.)

Non-white population increases over the last ten years have been most heavily concentrated in metropolitan counties. The non-white growth rate in these counties totaled 15.4, outpacing that among whites by approximately 3.0 persons per thousand population annually. In nonmetropolitan counties, however, the pattern was just reversed, with whites increasing at a two-to-one margin over non-whites.

While growth rates among whites living in both metropolitan and nonmetropolitan counties have increased over the last two decades, but have not varied greatly according to type of county, corresponding changes among non-whites in both residential sectors have been quite substantial. Non-whites in metropolitan counties, for example, were declining at an average annual rate of 3.2 during the 1960s, but gaining by 15.4 during the 1970s. And while the growth rate for nonmetropolitan blacks during the most recent decade fell considerably short of that recorded for those in metropolitan counties (7.1 versus 15.4), the transition that occurred in these counties over these two time periods (i.e., from -13.1 to 7.1, or a net change of 20.2 persons per thousand population) was actually slightly greater than that which took place in more populous sectors (from -3.2 to 15.4, for a net change of 18.6).

A. Whites

1. **Regions.** All seven regions of the State during both time periods were characterized by population increases among whites. For the most recent decade, all but one (the Black Belt) exhibited medium to high levels of increase. While growth rates in other regions ranged from a low of 9.1 (Central Coastal Plain-Wire Grass) to a high of 20.8 (Upper Coastal Plain), the Black Belt

was gaining whites at a rate of only 4.6 per thousand population annually. A modest net migration loss, combined with declining fertility levels, largely account for this relatively modest increase. (For specific data regarding various components of population change, see Table 4.)

For most regions of the State, whites have experienced accelerating rates of growth over the last two decades. This population segment grew approximately four times faster during the 1970s than in the 1960s in the Gulf Coast region, and almost twice as fast in the Upper Coosa Basin, Upper Coastal Plain, and Piedmont regions. Growth rates were essentially the same for the Black Belt, but dropped by approximately one-fourth in the Central Coastal Plain-Wire Grass and by slightly over one-half in the Tennessee Valley-Sand Mountain area.

2. **Counties.** White population increases occurred in fifty-seven of the State's sixty-seven counties during the 1970s. A similar pattern also held during the 1960s when fifty-four of sixty-seven counties experienced increases. During the 1970s, however, the rates of increase were generally somewhat higher, excluding such notable exceptions as Madison (from an average annual rate of gain of 65.6 during the 1960s to a loss of 1.9 during the 1970s) and Dale (from +80.0 to -15.4).

Counties in which the white population increased very rapidly during the 1970s (i.e., average annual growth rates in excess of 30.0) were: Autauga (41.7), Baldwin (35.1), Blount (36.5), Elmore (39.7), Houston (33.3), Jackson (31.8), Shelby (86.8), St. Clair (53.6), and Winston (31.5). All of these counties either contain large urban concentrations or are located in close proximity to such centers, and five of the nine are classified as "metropolitan counties" by virtue of their inclusion in the State's eight Metropolitan Statistical Areas.

Of the ten counties where whites experienced declines during the 1970s, seven are located in the Black Belt: Bullock (losing 11.1 whites per thousand population annually), Dallas (-8.1), Greene (-8.2), Macon (-11.2), Perry (-5.7), Sumter (-10.0), and Wilcox (-10.7). The three other counties experiencing losses were Dale (-15.4), Madison (-1.9), and Washington (-0.3). White declines in Madison County trace largely to changing manpower needs associated with the U.S. space program, while those in Dale are accounted for primarily by troop reductions following the cessation of the Vietnamese conflict.

In several counties, whites were experiencing population declines during the 1960s, but gains in the 1970s, i.e., Butler, Chambers, Cherokee, Conecuh, Covington, Crenshaw, Etowah, Hale, Henry, Lowndes, Pickens, Randolph, and Tallapoosa. All, incidentally, are nonmetropolitan counties with the exception of Etowah (Gadsden MSA).

Likewise, the reverse (gains during the 1960s, but losses in the 1970s) was also true for a number of Alabama counties, i.e., Bullock, Dale, Dallas, Greene, Macon, Madison, Perry, Sumter, Washington and Wilcox. Again, it is seen that a movement from gains to losses, atypical for Alabama whites during the 1970s, most heavily involved counties located within the Black Belt region.

3. **Metropolitan Statistical Areas.** Although the white population increase was slightly greater in nonmetropolitan than in metropolitan counties during the 1970s, almost all of the State's eight MSAs showed relatively strong growth. Whites, for example, increased at average annual rates in excess of 9.0 in all but one of the State's MSAs during this period. The one exception was the Huntsville MSA, growing at a rate of 5.4.

Over the last two decades, white growth rates have been relatively stable for the Florence, Anniston, and Tuscaloosa MSAs. The Birmingham MSA gained approximately 4.0 whites more per thousand population during the 1970s than in the 1960s, while even higher rates of increase over the two time periods (ranging from differences of 9.5 to 14.3) were registered for the Gadsden, Montgomery, and Mobile MSAs. The most substantial change in growth among whites by far has occurred in the Huntsville MSA, where the average annual rate of increase declined from 43.4 during the 1960s to only 5.4 during the 1970s.

Particularly noteworthy is that white metropolitan growth in recent years has

been most highly visible in outlying MSA counties rather than those in which the major urban concentration is actually located. Autauga, Baldwin, Elmore, Shelby, and St. Clair counties, for example, all achieved very high rates of increase during the 1970s. This pattern indicates the continuing suburbanization of metropolitan whites, as well as the tendency for white in-migrants to seek residence in areas somewhat removed, but within easy commuting distance of the central city.

B. Non-Whites

1. **Regions.** As indicated previously, non-whites grew at a fairly substantial pace during the 1970s, and that overall growth in this population sector fell just slightly below that recorded for whites. It was also observed that the pattern of the 1970s (i.e., population growth) was in marked contrast to the losses that characterized the 1960s.

Non-whites experienced gains in all seven regions of the State during the 1970s. The highest rates of increase occurred in the Tennessee Valley-Sand Mountain, Upper Coastal Plain, and Gulf Coast regions. All grew at average annual rates in excess of 14.0, with the Tennessee Valley-Sand Mountain region leading the State's non-white growth at 25.1. The Piedmont, Upper Coosa Basin and Black Belt were also characterized by impressive growth rates (ranging from 10.5 to 12.1), while the non-white increase in the Central Coastal Plain-Wire Grass region (at 5.6) was the lowest in the State.

During the 1960s, however, the non-white population was declining in all but two of the State's seven regions (Tennessee Valley-Sand Mountain and Gulf Coast). These declines, due largely to heavy out-migration, were greatest in the Black Belt (14.8 per thousand population) and least in the Upper Coosa Basin (a loss of 5.7). Even though the Gulf Coast region experienced growth during the 1960s, the increase was slight (at a rate of only 1.6). The only region, therefore, showing significant non-white increases during both time periods (i.e., 7.8 and 25.1, respectively) was the Tennessee Valley-Sand Mountain area.

2. **Counties.** Non-whites posted gains in all but eleven of Alabama's sixty-seven counties during the 1970s. For the 1960s, however, just the reverse was true. Declines occurred in fifty-eight counties, including every county in the Upper Coastal Plain and Black Belt.

Counties in which non-whites achieved very high average annual growth rates during the 1970s (i.e., of 30.0 or more) were DeKalb, Madison, Tuscaloosa, and Winston. Non-whites also increased rapidly in Calhoun, Cullman, Dale, Houston, Montgomery, Morgan, and Randolph counties, with average annual increases ranging from 20.0 to 30.0. All of these counties, with the exception of Montgomery, Dale, and Houston, are located in the northern portion of the State.

Counties showing declines in non-white population over the last ten years were concentrated in the Black Belt (Bullock, Hale, Perry, and Wilcox) and the Central Coastal Plain-Wire Grass (Butler, Conecuh, Covington, Crenshaw, and Russell). Two others—Limestone and Bibb—(both located in the northern half of the State) also experienced declines. These counties, with the exception of Bullock, Limestone, and Russell, form a nearly continuous band across the south-central portion of the State.

Although non-whites in all regions of the State experienced substantial differences in growth rates over the two decades, the greatest variations occurred in counties lying within the Upper Coastal Plain and Black Belt. In Tuscaloosa County (Upper Coastal Plain), for example, non-whites lost at a rate of 10.2 during the 1960s, but gained at an average annual rate of 35.8 during the 1970s. On the other hand, Montgomery County (Black Belt) experienced a rate of decline of 5.6 during the 1960s, but gained 29.5 during the 1970s. Not all changes, of course, were that dramatic, but these examples indicate very vividly the direction of population shifts occurring in a large number of Alabama counties between the 1960s and 1970s.

3. **Metropolitan Statistical Areas.** As noted previously, it was in metropolitan counties that non-white growth was

most greatly concentrated during the 1970s. Approximately 15.0 non-whites per thousand population were added to these counties between 1970 and 1980, as opposed to less than half that number in nonmetropolitan counties.

Non-white population increases occurred in all eight of the State's metropolitan areas during the 1970s, with highest rates of gain concentrated in the Tuscaloosa, Huntsville, Montgomery, and Anniston MSAs (all with average annual growth rates in excess of 20.0). For the Huntsville and Montgomery MSAs, unlike Birmingham, Florence, and Mobile, non-white growth was heavily based in central city metropolitan counties (i.e., Madison and Montgomery). Limestone County (contiguous to Madison), for example, experienced a declining population among non-whites, while the non-white sector in Autauga and Elmore counties (adjacent to Montgomery) increased only slightly. Hence, suburbanization of blacks (at least as it involves adjacent metropolitan counties) does not appear to be as characteristic of the Huntsville and Montgomery MSAs as for other multi-county metropolitan units in Alabama.

Non-whites posted declines in only two of Alabama's eighteen metropolitan counties during the 1970s (Limestone, Huntsville MSA, and Russell, Columbus, Georgia MSA). On the other hand, Madison County (Huntsville) experienced by far the most substantial increase—approximately 47.0 non-whites added per thousand population annually during the 1970s.

When non-white metropolitan trends over the last two decades are examined, demographic patterns generally show a reversal. Alabama MSAs were most typically losing non-whites during the 1960s but, as noted, gains characterized the 1970s. The only exceptions to this pattern were the Huntsville and Mobile MSAs. In the case of Huntsville, substantial growth rates were evident during both time periods, while Mobile went from a slight gain during the 1960s to a much higher rate of increase during the 1970s.

C. Comparison of White/Non-White Population Trends

In numerical terms, Alabama's population grew by 177,425 persons between 1960 and 1970 (a 5.4 percent increase), but added over twice as many—445,896—during the 1970s for an increase of 12.9 percent (Table I). The relatively slow rate of increase during the 1960s traces primarily to non-white population losses. During that period, non-whites experienced a numerical decrease of 72,797 (7.4 percent) while whites increased by 250,222 (11.0 percent). This differential, in effect, dropped the State's overall increase to 5.4.

On the other hand, Alabama's population growth rate during the 1970s, as opposed to that attained during the preceding decade, is accounted for chiefly by population changes (i.e., gains) among non-whites. During the 1970s, for example, the non-white growth rate was 12.1 (110,039 persons added), while whites grew only slightly faster at 13.3 (335,857 added). Radically changing demographic patterns among non-whites, therefore, helped to more than double the overall rate of increase in Alabama's population between 1970 and 1980.

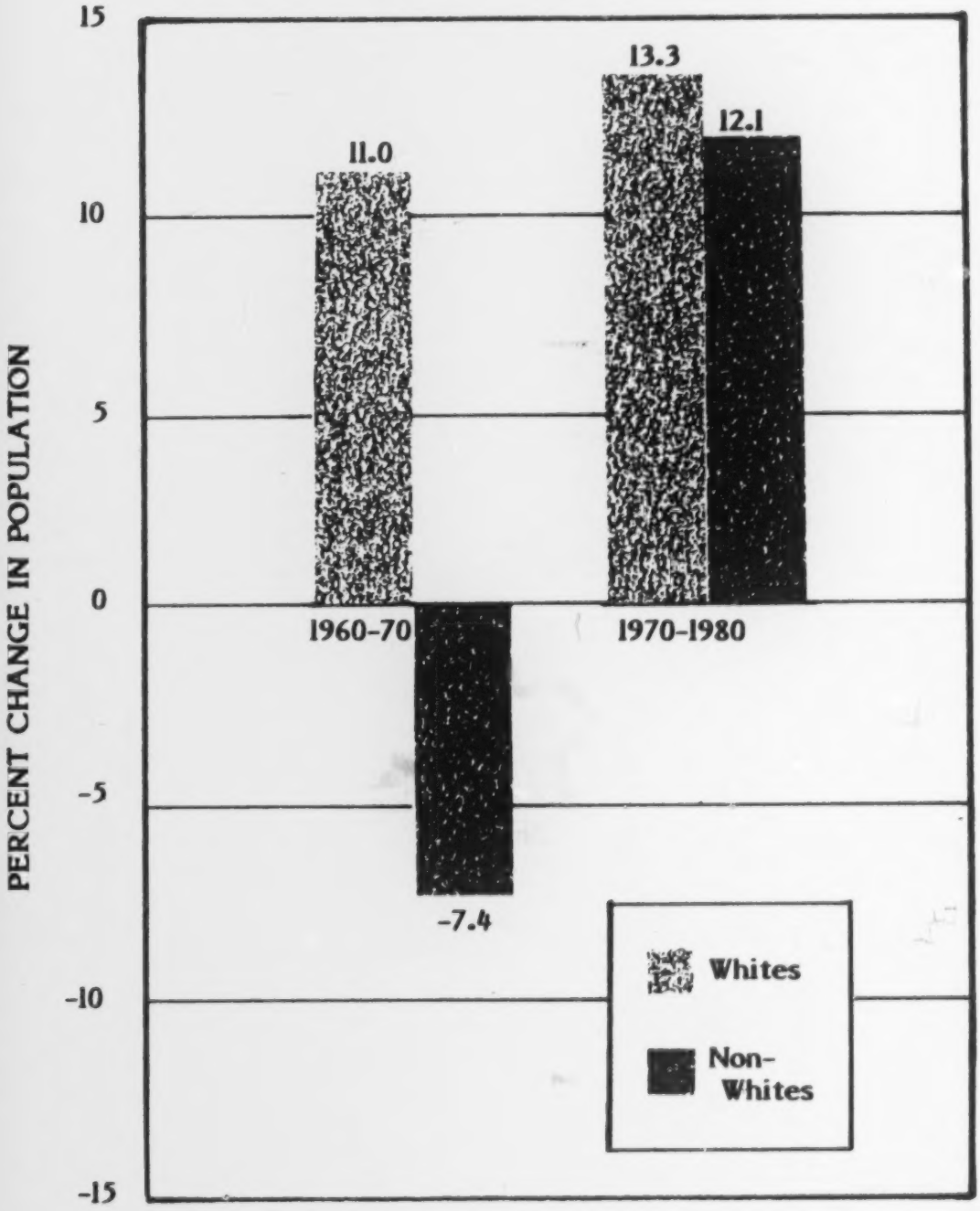
V. Components of Population Change

Three major factors are responsible for population change: (1) births, (2) deaths, and (3) migration. An excess of births over deaths (i.e., "natural increase") and/or an excess of in-migration over out-migration (i.e., "net in-migration") sets the stage for population increase. On the other hand, more deaths than births (i.e., "natural decrease") and/or more out-migration than in-migration (i.e., "net out-migration") introduces the possibility of population decline. The numerical values of these particular variables and the way in which they interrelate, therefore, have significant impact on the demographic sector. Together, they serve to determine the current status of a population, explain various historical features of a population, and give evidence as to future trends.

The data (see Table 3 for all data cited in Section V) indicate a substantial drop in Alabama's birth rate over the last two decades, but a slight increase in the death rate. During the 1960s, the average annual birth rate was 22.1 per thou-

FIGURE 3

PERCENT CHANGE IN ALABAMA'S POPULATION
1960-70 AND 1970-80, BY RACE



sand population, while during the 1970s it had dropped to 17.9. This amounts to a net decline of 4.2 births per thousand population; a decrease of 19.0 percent.

The State's average annual death rate, on the other hand, has increased by only 0.2 per thousand population over the two time periods leading to a modest 2.0 percent increase. Both birth rates and death rates in Alabama over the last two decades have generally been a bit higher than those recorded for the U.S. In 1970, for example, the crude birth rate for Alabama was 19.6 while that for the U.S. was 18.4. Similarly, in 1970 the State's crude death rate was 9.8, but 9.5 for the U.S.[9] Over the last few years, however, the trend has been toward convergence, with only slight variations observed for both birth and death rates during 1980.[10]

The most substantial alteration in population change components, however, traces to migration. During the 1960s, approximately 7.0 more persons per thousand population annually were leaving the State than entering. During the 1970s, however, 5.0 more persons per thousand were entering than moving away.

Traditionally, Alabama has relied on a high rate of natural increase (i.e., more births than deaths) to counteract heavy migration losses. This was the case during the 1960s, when the birth/death differential made for a rate of natural increase of 12.3 (average annual birth rate of 22.1 minus a death rate of 9.8). This, of course, was more than enough to offset the net migration loss that also occurred during that period (i.e., 6.9 per thousand population). During the 1970s, however, the average annual rate of natural increase dropped to only 7.9 but, instead of a net migration loss, a net gain was recorded (i.e., 5.0 per thousand population annually). While natural increase, therefore, declined as a factor in population growth during the 1970s, migration became a much more important contributor—nearly as important as the natural increase. (See Figure 4.)

Patterns characteristic of both metropolitan and nonmetropolitan counties over the last two decades are similar to those observed for the State as a whole. Average annual birth rates declined significantly, while death rates increased slightly; net migration losses were the rule during the 1960s, but net gains characterized the 1970s. In addition, the excess of in-migration over out-migration during the 1970s was slightly higher in metropolitan than nonmetropolitan counties (5.4 vis-a-vis 4.4). Net migration losses, however, were somewhat greater for nonmetropolitan than metropolitan counties during the 1960s (i.e. 8.8 versus 5.7). Hence, the overall change in migration tendencies during the past two decades has actually been slightly greater for those counties more socially and economincally removed from the influence of large urban concentrations.

A. Components of Change by Region

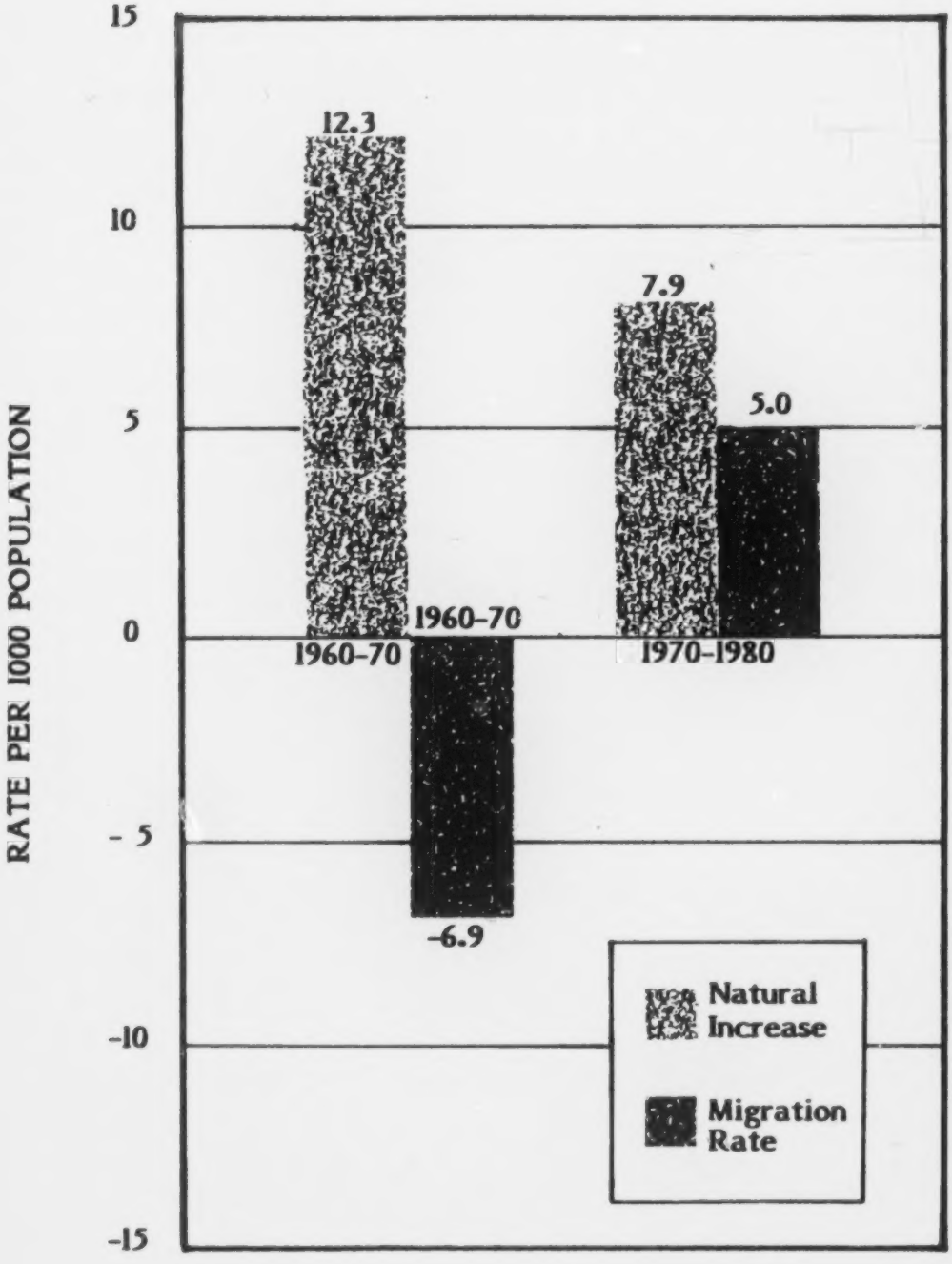
1. **Births and Deaths.** The highest average annual birth rates for Alabama regions during the 1970s were recorded in the Gulf Coast and the Black Belt (19.8 and 19.6, respectively), while the lowest occurred in the Tennessee Valley-Sand Mountain area and the Upper Coosa Basin (16.7 and 16.9). Overall, therefore, variations in birth rates were relatively small (a difference, from high to low, of only 3.1 births per thousand population).

The Black Belt registered the highest average annual death rate during the 1970s (at 10.8), while the lowest occurred in the Tennessee Valley-Sand Mountain area (8.5). All other regions were grouped fairly close together, with average annual mortality rates ranging from 9.4 (Gulf Coast) to 10.4 (Upper Coastal Plain and Central Coastal Plain-Wire Grass).

Fertility rates have declined in all regions of the State over the last two decades. The largest decrease by far has occurred in the Tennessee Valley-Sand Mountain region, where the average annual birth rate has fallen by approximately one-third (from 25.5 to 16.7). In other regions the magnitude of the decline has ranged from 2.8 (Upper Coastal Plain) to 4.3 (Gulf Coast). The huge drop in fertility rates in North Alabama probably reflects the heavy decline of migration into the Huntsville area (which has involved younger persons primarily who are prone toward

FIGURE 4

RATES OF NATURAL INCREASE AND NET MIGRATION RATE FOR ALABAMA, 1960-70 AND 1970-80



higher fertility). With the cessation and retrenchment of various NASA programs during the early 1970s, however, the area has evidently become considerably less attractive to many potential migrants.

The data indicate very little variation in death rates over the past two decades. Mortality levels have increased slightly in four regions (Upper Coastal Plain, Gulf Coast, Upper Coosa Basin, and the Black Belt), but declined a bit in the others (Tennessee Valley-Sand Mountain, Piedmont, and Central Coastal Plain-Wire Grass).

2. **Migration.** Five of Alabama's seven regions (all but the Central Coastal Plain-Wire Grass and the Black Belt) scored net migration gains during the 1970s, while six of seven (all but the Tennessee Valley-Sand Mountain) registered losses during the 1960s. The most dramatic changes in migration tendencies over these two time periods have involved the Black Belt, Gulf Coast, and the Upper Coastal Plain. All went from moderate to substantial losses to either large declines in rates of loss or moderate to fairly substantial net gains. Notable changes were also recorded for the Piedmont (from -6.1 to +7.9), Upper Coosa Basin (-7.2 to +5.5), and the Central Coastal Plain-Wire Grass (-8.5 to -0.5).

Of particular significance, however, is the Black Belt. This region had an average annual rate of net migration loss of 18.7 during the 1960s, but a net loss of only 1.1 during the 1970s. Throughout most of the 20th century, the Black Belt has been one of the most economically depressed regions of the State, with high levels of out-migration among nonwhites a firmly entrenched pattern. Now, however, the indigenous population (which is heavily non-white) is showing much less likelihood of moving (see the following Section for additional discussion), and the future may even hold prospects for net migration gains. A huge General Electric complex, for example, is currently scheduled for construction in Lowndes County, with a projected employment level of over 1,000 workers by 1995.[11]

All regions of the State, with the exception of the Tennessee Valley-Sand Mountain area, have shown either a transition from losses to gains (four regions), or reduced rates of loss (two regions), over the last two decades. For the Tennessee Valley area, however, the rate of net migration gain during the 1960s averaged 7.4 but had dropped to 6.0 during the 1970s. While only a slight decrease, this decline probably reflects the recent slowdown in movement into the Huntsville area.

The net migration gains posted among Alabama regions during the 1970s, vis-a-vis the losses of the 1960s, trace in part to the resurgence in population growth that has occurred throughout the South generally over the past decade. From 1970 to 1975, for example, 2.6 million more persons moved into the South than moved out. This was the largest net migration gain achieved by any U.S. region during that period, and was over six times greater than the net gain (i.e., 0.4 million persons) added between 1965 and 1970.[12]

B. Components of Change for Counties

1. **Births and Deaths.** Alabama counties having the highest average annual birth rates during the 1970s (i.e., of 20.0 or more) were Autauga, Clarke, Dallas, Houston, Lowndes, Mobile, Monroe, Shelby, St. Clair, Wilcox, and Winston. In addition, a number of other counties had average annual birth rates that were just short of 20.0. Generally, the counties with high fertility rates have either experienced elevated levels of youthful in-migration (i.e., St. Clair, Shelby, Autauga, etc.) or the existing age structure (i.e., a high proportion of younger persons) is conducive to increased reproductive activity (various Black Belt counties).

At the other extreme, several Alabama counties had relatively low birth rates during the 1970s (i.e., below 16.0). The State's lowest average annual birth rate (at 14.8) occurred in Fayette County (Upper Coastal Plain).

The highest mortality levels in Alabama during the 1970s were generally found in the Black Belt, where three counties had in excess of 12.0 deaths per thousand population annually (Bullock, Greene, and Hale) and the area as a whole averaged 10.8. Fourteen other counties across the State, however, had

average annual death rates of 12.0 or more, and Crenshaw County (at 14.0) had the highest mortality rate of all.

In the United States, counties with high mortality levels generally have older populations. The young migrate out in large numbers, leaving behind a resident population with a somewhat higher median age. Not to be discounted, however, is the effect of differential health levels, particularly as they relate to race. Alabama's Black Belt region, for example, while having a fairly young population (particularly among the majority non-white sector) *and* high fertility rates, have also been experiencing higher mortality rates than other Alabama regions in recent years.

Counties registering very low mortality rates during the 1970s (all below 8.0), were Madison, Lee, and Dale. Very youthful populations largely account for these patterns. In the case of Lee County, for example, the presence of Auburn University predisposes the age structure toward a very large proportion of younger persons.

Birth rates declined in sixty-four of Alabama's sixty-seven counties between the 1960s and 1970s. The only exceptions were Shelby, Crenshaw, and Henry counties, the latter two located in the Central Coastal Plain-Wire Grass. In these instances, however, increases were only marginal—amounting to considerably less than one birth per thousand population. The largest declines in birth rates by far occurred in Madison and Dale counties, where high rates of in-migration during the 1960s but out-migration during the 1970s (again involving a significant number of young persons) combined to make for overall declines in average annual rates of 18.7 and 13.6, respectively.

Mortality rates increased in forty-eight of the State's sixty-seven counties over the two time periods. Most of the increases were slight, ranging from one to two additional deaths per thousand population annually. Elevated mortality rates as indicated, are accounted for primarily by higher median ages and a growing proportion of elderly in the population.

Mortality declines (all slight) were registered in seventeen counties over the two decades, and in two counties (Lawrence and Coffee) mortality levels remained unchanged.

2. **Migration.** While most Alabama counties (i.e., forty-seven) experienced net migration gains during the 1970s, there was considerable variation as to the magnitude of the surplus. The counties with the heaviest gains were located near Birmingham—Shelby, St. Clair, and Blount. All of these counties achieved net gains in excess of 29.0 migrants per thousand population annually. Counties showing net rates of gain of 20.0 to 29.0 included Autauga, Baldwin, DeKalb, Elmore, Houston, Jackson, Marion, and Winston. Ten of these eleven rapidly growing counties are located within, or adjacent to Metropolitan Statistical Areas. Another, Houston, is the most populous county by a considerable margin in the southeastern portion of the State.

Counties having the greatest net migration losses were most typically located in the southern portion of the State. Nine of the eleven counties located in the Black Belt, for example, suffered net migration losses during the 1970s, seven of which had average annual rates of loss in excess of 8.0. In addition, eight counties in the Central Coastal Plain-Wire Grass experienced net out-migration, including Dale with a rate of loss totaling 23.6 (highest for the State). In only three counties were there more persons leaving than entering during this period (Madison [-3.9], Jefferson [-1.7], and Pickens [-1.2]).

While all but twenty Alabama counties exhibited net migration gains during the 1970s, fifty-six of the State's sixty-seven counties experienced losses during the 1960s. Declines were particularly great in Black Belt counties (several with average annual net migration losses in excess of 25.0) and those in the Central Coastal Plain-Wire Grass.

A number of counties have shown substantial variations in direction of movement over the last two decades. For most, as indicated, the change has involved a movement from losses to gains. Both Madison and Dale, however, experienced heavy in-migration during the 1960s (average annual rates of 32.8 and 45.8, respectively), but losses during the 1970s (-3.9 and -23.6). Very rapid population changes such as these, of

course, call for considerable adjustment and resiliency on the part of local institutions, including schools, businesses, churches, social service agencies, and various units of local government.

Overall, the data reveal that a very significant transition has taken place in most Alabama counties over the last two decades: from fairly heavy net migration losses to either substantial reductions or moderate to heavy net migration gains. Lower rates of non-white out-migration, as will be shown in the final section of this report, constitute an important factor in that transition.

C. Components of Change for MSAs

1. **Births and Deaths.** Both birth and death rates were slightly lower in metropolitan counties than in nonmetropolitan locales during the 1970s. Likewise, as indicated earlier, the rate of net migration gain was slightly higher. During the 1960s, however, the average annual birth rate was slightly greater in metropolitan counties, while both types of counties suffered moderate net migration losses.

Like the State as a whole, Alabama's metropolitan areas have experienced declining birth rates over the last two decades. While the overall decline totaled 4.8 fewer births per thousand population annually (a decrease of 21.6 percent), declines occurring in the Florence and Huntsville MSAs and Russell County (Columbus, Georgia MSA) were somewhat greater. Average annual birth rates for the Huntsville MSA, for example, were approximately halved (from 29.7 to 16.1) over the two time periods under consideration.

Mortality rates have increased in seven of the State's eight MSAs (i.e., all but Huntsville) over the last twenty years. Increases for all but one metropolitan area have been slight, ranging from 0.3 to 0.7 additional deaths per thousand population. The average annual death rate for the Gadsden MSA, however, increased by 1.6 during this time period.

2. **Migration.** There has been considerably more variation in migration rates among the State's MSAs during the last two decades than in either birth or death rates. All but one Alabama metropolitan area (Huntsville) had more out-migrants than in-migrants during the 1960s. During the 1970s, however, all experienced net gains—with the exception of Russell County (Columbus, Georgia MSA).

While all eight MSAs have shown considerable variation in net migration rates over the years, the greatest changes have occurred in Montgomery (from an average annual net loss of 8.6 migrants during the 1960s to a gain of 12.1 during the 1970s), Mobile (-11.8 to 7.0), and Huntsville (18.9 to 0.6). The reduced rate of gain in the Huntsville MSA, incidentally, is accounted for entirely by changes occurring within Madison County.

For individual metropolitan counties, the greatest net migration gains by far during the 1970s occurred in those surrounding central cities. Marshall (Huntsville MSA), St. Clair, Shelby, and Walker (Birmingham MSA), Autauga and Elmore (Montgomery MSA), and Baldwin (Mobile MSA), for example, all experienced substantial in-migration.

Even though migration is becoming a more prominent factor in the growth of Alabama's metropolitan areas, natural increase (more births than deaths) is still the primary explanation for population increase. Approximately 61.0 percent of the State's total MSA growth during the 1970s, for example, can be attributed to this cause.

VI. Components of Population Change According to Race

For both whites and non-whites throughout the State, fertility levels have declined fairly substantially over the last two decades. The drop has totaled 4.4 births per thousand population for whites (21.8 percent) and 3.0 for non-whites (11.3 percent). Death rates, on the other hand, have either increased very slightly (whites) or remained the same (non-whites). (See Table 4 for all data cited in Section VI.)

The data also indicate that, during both decades, non-white fertility levels were substantially higher than those for whites (approximately 6.0 births per thousand more during the 1960s; 8.0 during the 1970s). The pattern of higher rates among non-whites also held for

mortality, but the white/non-white differential which existed during the 1960s (2.2 deaths per thousand population annually) had decreased slightly (to 1.8) during the 1970s.

The greatest change, however, involving whites vis-a-vis non-whites traces to migration. While whites were experiencing a barely discernable migration loss during the 1960s (0.1 persons per thousand population annually), non-whites were losing at a very substantial rate (i.e., approximately 23.0). During the 1970s, however, the non-white rate of loss was reduced to a miniscule 0.2, while whites showed a moderate gain (i.e., 6.9).

Changing migration patterns are undoubtedly related to the development of a more positive view toward the South generally as a favorable destination for potential movers. Historically, "push" factors (most notably, economic considerations) were responsible for high out-migration rates (particularly among non-whites). With the recent expansion and decentralization of the industrial sector, however, combined with considerations relative to favorable climate, lifestyle, cost-of-living, and changes in black/white relationships, the State has been able in recent years to attract more people (at least whites, and nearly so in the case of non-whites) than are leaving.[13]

Although changes in non-white migration tendencies are readily apparent, overall population growth for this group (an increase of 12.1 percent between 1970 and 1980) is still accounted for totally by natural increase. Hence, the excess of births over deaths amounted to 12.2 per thousand population annually during this period, greatly overshadowing the small net migration loss. In the case of whites, however, net migration gains during the 1970s actually outstripped the natural increase as a factor in population growth (6.9 versus 6.3). (See Figure 5.)

Like the State as a whole, both metropolitan and nonmetropolitan counties have experienced a decline in birth rates among both whites and non-whites over the last two decades. Mortality rates, however, have increased in nonmetropolitan counties among both groups, and for metropolitan whites, but not non-whites (where the rate has declined slightly). There was an absence of significant variation in birth rates for each individual group, however, by metropolitan/nonmetropolitan residence during each period. A lack of variation also held for the death rate among non-whites. For whites, however, a tendency toward higher death rates during each decade was characteristic of residents of nonmetropolitan counties.

Both whites and non-whites, residing in metropolitan counties posted net migration gains during the 1970s. The non-white rate of gain was a little below that observed for whites (i.e., 2.2 less). Only whites, however, achieved a net migration gain in nonmetropolitan counties. This gain, furthermore, was approximately 1.5 times greater than that posted by this group in metropolitan counties (8.4 vis-a-vis 6.0).

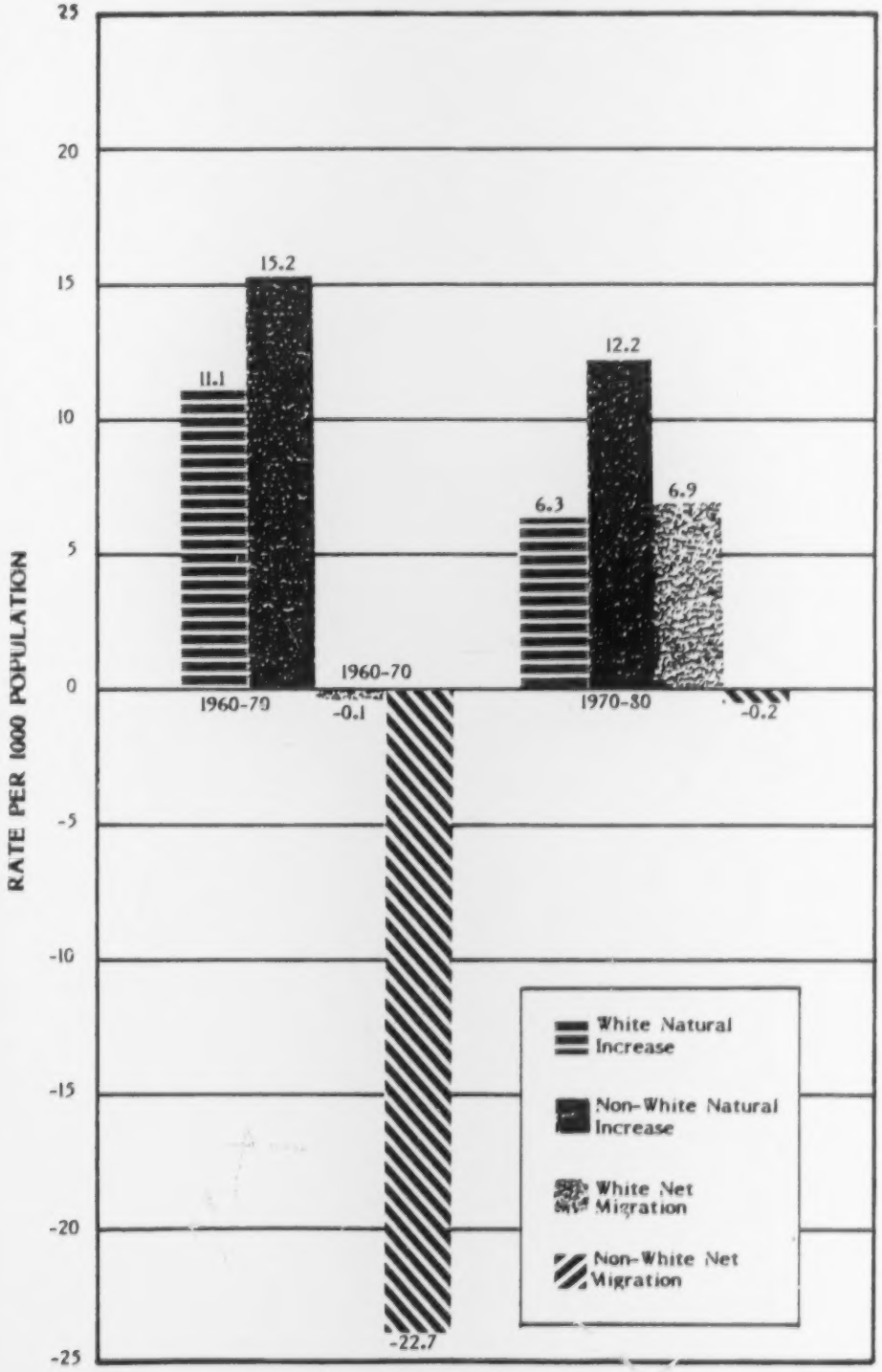
Major changes in migratory tendencies according to race, therefore, have emerged over the last two decades. Whites have moved from either a slight loss (metropolitan counties) or a slight gain (nonmetropolitan counties) to moderate gains in both. Non-whites, on the other hand, have changed from substantial losses in both metropolitan and nonmetropolitan counties to either a moderate net gain (metropolitan counties) or only a moderate loss (nonmetropolitan counties). White increases, therefore, were characteristic of both types of counties during the 1970s (but were slightly larger in nonmetropolitan counties), while growth among non-whites was concentrated in metropolitan counties.

A. Components of Change by Region and Race

1. **Births and Deaths.** For whites, birth rates were relatively low in almost all regions of the State during the 1970s. The lowest average annual birth rate for any region was recorded in the Black Belt (14.5), while the highest occurred in the Gulf Coast (17.8). For non-whites, fertility levels were generally 8 to 10 births higher per thousand population than those among whites. The lowest non-white birth level was registered in the Upper Coosa Basin (21.0), while the

FIGURE 5

RATE OF NATURAL INCREASE AND NET MIGRATION RATE FOR ALABAMA, 1960-70 AND 1970-80, BY RACE



highest was recorded in the Upper Coastal Plain (25.9).

Both white and non-white fertility levels were higher in all Alabama regions during the 1960s than in the 1970s. For whites, the overall decline in birth rates over the two decades averaged 4.2 per thousand population, while that among non-whites was 3.3. The greatest change in white fertility patterns occurred in the Tennessee Valley-Sand Mountain area, where the average annual rate declined over the two time periods by 9.1. The largest alteration among non-whites also took place in that same region (a decline of 6.2). Once again, changes for both groups can be traced largely to the significant population movement that has occurred in and around the Huntsville area over the last two decades.

Higher fertility rates among non-whites are accounted for to a great extent by the high concentration of blacks in lower socioeconomic status levels. Research studies generally show, for example, an inverse relationship between social class standing and fertility levels.[14] A relatively large proportion of the State's non-white population also resides in rural areas, another historical correlate of high birth rates.[15] Other variations in reproductive tendencies may be explained by the characteristic arrangement of the age structure, wherein a relatively high proportion of older persons is conducive to lower fertility rates (and vice versa).

Mortality rates were higher in all Alabama regions among non-whites than whites during the 1970s. The differential was relatively low, however, generally amounting to only one or two deaths more per thousand population annually. Higher non-white mortality rates trace to lower life expectancy levels. In Alabama between 1969 and 1971, for example, the estimated life expectancy for non-white males was seven years less than that among white males.[16] A major reason for lower life expectancy levels is the higher infant mortality rates found among members of this group. In 1980, the infant mortality rate (i.e., deaths to youngsters under one year of age per thousand live births) was 11.6 for whites, but 21.4 for non-whites.[17]

Very little change has occurred among various Alabama regions in white/non-white mortality levels over the last two decades. For whites, the death rate has increased slightly in four Alabama regions (Gulf Coast, Upper Coosa Basin, Upper Coastal Plain, and Black Belt), but declined slightly in the other three (Tennessee Valley-Sand Mountain, Piedmont, Central Coastal Plain-Wire Grass). Among non-whites, mortality rates were stationary in four regions (Upper Coastal Basin, Central Coastal Plain-Wire Grass, Piedmont, and Gulf Coast), slightly higher in two (Black Belt and Upper Coastal Plain), and lower in the other (Tennessee Valley-Sand Mountain).

2. **Migration.** During the 1970s, whites entered all regions of the State in greater numbers than those leaving except for the Black Belt. Even here, the average annual rate of loss was very slight—amounting to only 0.2. Net migration gains were most heavily concentrated in the Upper Coastal Plain (15.3), Piedmont (11.4), and Gulf Coast (9.3). For other areas of the State, only moderate to slight rates of increase (ranging from 2.8 to 6.9) were observed.

Non-white migration gains during the 1970s were concentrated in the Tennessee Valley-Sand Mountain area, with approximately 12.0 more non-whites added per thousand population annually than the number leaving. The highest loss on the other hand occurred in the Central Coastal Plain-Wire Grass region (-8.1). Other regions either showed only slight losses or light gains (ranging from a rate of loss of 2.0 in the Black Belt to a gain of 3.5 in the Upper Coastal Plain).

During the 1960s, non-whites were leaving all Alabama regions in much greater numbers than those entering. The rate of net migration loss ranged from a low of 10.6 persons per thousand population annually (Tennessee Valley-Sand Mountain) to a high of 29.5 (Black Belt). During the 1970s, however, losses were either greatly curtailed (Black Belt, Central Coastal Plain-Wire Grass, and Piedmont) or had changed from net losses to slight to moderate gains (the remaining four regions).

Among whites, changes in migration tendencies were much more moderate

and not as clearly patterned as those for non-whites. The general tendency, however, was for either increased rates of gain, or a transition from net losses to net gains for various Alabama regions. The greatest overall alterations over the last two decades have occurred in the Piedmont, Upper Coosa Basin, Upper Coastal Plain, and Gulf Coast (with changes in units of measurement ranging from 9.3 to 18.0), while in the Tennessee Valley-Sand Mountain region the net gain has been reduced by approximately one-half (from 10.2 to 5.3).

B. Components of Change by County and Race

1. **Births and Deaths.** Birth rates among whites have declined in sixty-two of the State's sixty-seven counties over the last two decades. The only counties experiencing increasingly higher fertility rates were Crenshaw, Henry, Lowndes, Shelby, and St. Clair. Increases were slight for all of these counties except Shelby. In this instance, the average annual birth rate increased by approximately 3.0 per thousand population (or 16.0 percent). Shelby, as indicated previously, was the most rapidly growing county in the State during the last decade. Since much of this growth stemmed from a large influx of migrants (younger persons particularly), higher fertility rates have been the result.

The greatest changes in white fertility levels over the last twenty years have occurred in Madison and Dale counties. Both counties experienced relatively heavy out-migration of whites during the 1970s which, in turn, probably correlates with the huge drop in fertility rates that has also taken place (Madison from 34.3 to 13.8; Dale from 33.7 to 18.2).

During the most recent decade, the white fertility level has been lowest in Greene County. Owing to an older population, probably reflecting high out-migration of youth in years past, whites reproduced at an annual average rate of only 8.7. Whites recorded relatively high birth rates (i.e., in excess of 20.0) in only two counties during this period—Shelby and Winston.

Among non-whites, reproductive levels were almost universally higher during the 1960s than in the 1970s (i.e., in sixty-one of sixty-seven counties). The birth rate remained stationary in Crenshaw County, and increased only slightly in Chilton, Henry, Macon, Randolph, and Tuscaloosa counties. The largest increase occurred in Randolph County (Piedmont region), where the average annual birth rate was 3.6 per thousand higher during the 1970s than in the 1960s. The most drastic change occurred in Shelby County, however, as the fertility level declined from a rate of 35.4 during the 1960s to 23.2 during the 1970s (a decrease of approximately 35.0 percent).

In twenty-nine Alabama counties during the 1970s, non-whites had average birth rates of 25.0 or more. Only one county, Randolph, recorded a rate of more than 30.0. At the other extreme, just five counties had average annual rates of less than 20.0.

Without exception, birth rates were higher in Alabama counties for non-whites than whites during the last decade. In most cases, the differences were substantial (i.e., an average of 7.0 to 8.0 births per thousand population). This same pattern also held during the 1960s, except that in two cases (Madison and Dale counties) birth rates among whites were slightly in excess of those for non-whites.

Throughout Alabama, mortality levels among whites were generally higher during the 1970s than in the 1960s. This pattern emerged in forty-eight of the State's sixty-seven counties. If fifteen counties, death rates declined (over half of which were located in the Black Belt and the Central Coastal Plain-Wire Grass), while in the other four they remained stationary. For non-whites, however, the ratio between counties with increasingly higher death rates and those decreasing was much more equal (i.e., thirty-four increasing versus thirty-two decreasing), with mortality rates in one county remaining the same.

Several Alabama counties have experienced substantial changes in mortality levels over the last two decades. For non-whites, notable declines (ranging from 2.4 to 7.1) have occurred in Cullman, Dale, DeKalb, Madison, and Marshall counties. Winston County, on the

other hand, has experienced a large increase (from 17.3 to 31.7). Since the number of non-whites residing in this county is so small, however, this change is probably not reflective of a more general trend.

Among whites, substantial variations in mortality rates appeared with somewhat less frequency and intensity. The largest declines in average annual death rates, for example, occurred in Dale and Autauga counties (2.9 and 2.8, respectively), while the largest increase was in Hale (2.2).

Several Alabama counties registered very favorable mortality levels among whites during the 1970s: Dale (5.2), Madison (5.7), Lee (5.9), and Tuscaloosa (7.8). Crenshaw County, on the other hand, recorded the highest mortality rate in the State during this period (at 14.4). Relatively high non-white mortality levels also surfaced in several counties: Walker (15.1), Marion (14.5), Morgan (14.2) and, as previously noted, Winston. Cullman and Dale counties, however, were characterized by very low non-white mortality rates (i.e., 6.3 and 7.8).

2. **Migration.** Non-white migration losses as indicated earlier, have declined substantially throughout the State over the last two decades. During the 1960s, for example, sixty-five of the State's sixty-seven counties experienced net migration losses among non-whites (i.e., all but Madison and Dale), while the number of counties experiencing such losses during the 1970s was reduced by one-third to a total of forty-three.

Non-white outward movement during the 1960s was generally quite heavy. Twenty-one counties, for example, had average annual rates of loss in excess of 30.0 persons per thousand population. In addition, a high proportion of those losing at this level (i.e., fifteen of twenty-one) were concentrated in the Black Belt and the Central Coastal Plain-Wire Grass regions.

Although non-white losses continued to be the norm during the 1970s, excess outward movement involving individual counties had greatly diminished. Twenty-six of the forty-three counties experiencing net migration losses, for example, were losing less than 10.0 persons per thousand population. Once again, however, those counties losing non-whites most heavily were most frequently located in the Black Belt and the Central Coastal Plain-Wire Grass. In fact, slightly over half of all Alabama counties showing net out-migration of non-whites during this period (i.e., twenty-two) were located in these two regions. Substantial non-white migration gains (i.e., in excess of 15.0), however, occurred in five Alabama counties: Madison (an annual average gain of 29.7), Tuscaloosa (19.3), DeKalb (18.6), and Montgomery (15.1). Winston County also exhibited a large net gain, but the non-white population base in this instance is so small that only a slight change in numbers produces a substantial change in rates.

As was true for non-whites, net losses among whites were also characteristic of a majority of Alabama counties during the 1960s (i.e., forty-two of sixty-seven). Although approximately two-thirds of all counties experienced net out-migration of whites, these losses were generally not as great as those observed for non-whites. All but three counties having excess outward movement, for example, were losing at an average annual rate of less than 10.0. Several counties (Autauga, Dale, Lee, Madison, and Wilcox) also achieved very high rates of gain (i.e., in excess of 20.0).

During the 1970s, net migration losses among whites (almost all ranging from low to moderate) occurred in only thirteen counties. Eleven of those sustaining losses were located in the Black Belt and Central Coastal Plain-Wire Grass regions, with the heaviest losses occurring in Dale County (at 28.5 per thousand population annually). Several counties, on the other hand, showed huge gains. Autauga, Baldwin, Blount, Elmore, Shelby, and St. Clair, for example, all had average annual rates of gain of more than 28.0 persons per thousand population.

There were substantial differences in white/non-white migration patterns in several Alabama counties during the 1970s (i.e., mainly counties in which whites experienced significant gains, while non-whites lost or gained only

slightly). Most of these cases involve metropolitan counties, however, and will be noted at the end of this section.

C. Components of Change by Metropolitan Statistical Areas and Race

1. **Births and Deaths.** White fertility levels have declined in all Alabama MSAs over the last two decades. This same pattern also holds for non-whites, except for the Tuscaloosa MSA where the birth rate has increased slightly. The largest fertility declines among both whites and non-whites have occurred in the Huntsville MSA. For whites, the decline has amounted to 14.9 births per thousand population annually; for non-whites, 8.4. Declines of this magnitude are clearly atypical, however, and related to rapid changes in the direction of migrant flow.

Among whites, fertility rates for individual metropolitan counties have declined most precipitously in Madison (Huntsville), i.e., from 34.3 during the 1960s to only 13.8 during the 1970s. Slight increases have occurred in Shelby and St. Clair counties, however, due to large net migration gains. On the other hand, the non-white fertility level in Shelby County has declined by 12.2 births per thousand population over the two decades. This represents the largest drop recorded for any county, whether metropolitan or nonmetropolitan, in the State.

Mortality levels for both whites and non-whites do not show much variation over the last twenty years. For whites, rates have generally increased slightly (seven of eight MSAs), but among non-whites decreases have occurred in three of the State's eight MSAs. For all metropolitan areas, however, non-white mortality levels during both decades were higher than those among whites. This same pattern was characteristic of fertility rates as well.

2. **Migration.** All of Alabama's eight MSAs, as well as Russell County (Columbus, Georgia MSA), were losing more non-whites than were entering during the 1960s. For whites, however, this pattern held in only five of eight MSA's, and rates of loss were considerably less than those occurring among non-whites. During the 1970s, however, net migration gains were the rule in all MSAs among both whites and non-whites except for one metropolitan area each. For whites, a moderate net loss occurred in the Huntsville MSA, while among non-whites a slight loss was registered in the Gadsden MSA. In addition, non-whites in Russell County (Columbus, Georgia MSA) continued to show heavy outward movement.

Several individual metropolitan counties displayed considerable variation in white/non-white migration tendencies during the 1970s. St. Clair and Shelby (Birmingham MSA), Autauga and Elmore (Montgomery MSA), and Baldwin (Mobile MSA) all, for example, experienced substantial net migration gains among whites (i.e., in excess of 28.0 migrants per thousand population annually), but net losses—or only very slight gains—among non-whites. In addition, white losses in Madison County (Huntsville MSA) averaged 10.0 per thousand population annually, while non-whites were gaining at a rate of approximately 30.0. Four other central city metropolitan counties (Calhoun, Jefferson, Montgomery, and Tuscaloosa) also experienced either larger gains among non-whites than whites or non-white gains in instances where whites were losing. Hence, there appears to be a tendency for non-white migrants to prefer central city residence, but for migratory whites to settle in suburbs.

VII. Summary

Alabama's population grew by more than twofold during the 1970s as compared to the 1960s and, with only one exception, all seven of the State's major geographic regions achieved higher growth rates during the 1970s than in the 1960s. At the county level of analysis, the data revealed that population declines occurred in thirty-two of the State's sixty-seven counties during the 1960s. This pattern, by contrast, was reversed in the most recent decade with fifty-nine counties registering population gains. During both decades, metropolitan growth rates were higher than those recorded for nonmetropolitan areas. During the 1970s, however, the rapid growth rate achieved by nonmet-

ropolitan areas nearly matched that occurring in metropolitan areas.

The Upper Coastal Plain was the most rapidly growing area of the State during the 1970s. In contrast, the Black Belt region had the lowest rate of increase. Among individual counties, Shelby, St. Clair, and Blount achieved the highest growth rates in the 1970s. All are adjacent to Jefferson County (Birmingham), the State's largest metropolitan area. Each of the State's eight Metropolitan Statistical Areas (MSAs), with the exception of Huntsville, either experienced an increased rate of growth, or made a transition from a slight loss to a moderate gain, between the 1960s and 1970s. During the latter decade, the Montgomery MSA was the most rapidly growing metropolitan area in the State.

In the 1970s, both whites and non-whites increased their absolute numbers in each of the seven regions. This pattern also held for whites during the 1960s, while the number of non-whites was declining in five of the State's regions. Both whites and non-whites increased their numbers in a vast majority of Alabama's counties during the 1970s. Once again, this pattern held true for whites during the 1960s, but non-whites were characterized by population losses in fifty-eight of Alabama's sixty-seven counties during this same period. Both whites and non-whites registered gains in all eight of the State's MSAs during the 1970s. White growth rates were highest in metropolitan counties surrounding counties in which major urban concentrations are located. Non-white increases, on the other hand, were most visible in counties containing major urban concentrations.

The data regarding components of population change indicate that for the State as a whole, as well as for both metropolitan and nonmetropolitan counties, fertility rates have declined substantially over the last twenty years. Declining fertility rates have also been the rule for all seven regions of the State. Mortality rates, on the other hand, have increased slightly for the State, among both metropolitan and nonmetropolitan counties, and in four of the State's seven regions. Traditionally, Alabama has depended on an excess of births over deaths (i.e., "natural increase") to overcome heavy net migration losses. During the 1970s, however, a declining fertility rate, alongside a slightly increasing mortality rate, served to reduce the rate of natural increase to a level considerably below that recorded in the 1960s.

The greatest variation in population change components, however, traces to migration. Whether at the State, regional, or county level of analysis, there has generally been a transition from net migration losses to net gains. Furthermore, areas not registering gains during the 1970s generally experienced declining rates of loss over those recorded in the 1960s. While the data indicate that natural increase is still the most important factor in population increase, they also reveal that net migration gains contributed substantially to Alabama's growth during the 1970s.

Both whites and non-whites have experienced declining fertility rates over the last two decades. This trend holds true at all levels of analysis, including both metropolitan and nonmetropolitan counties, regions, and the State as a whole. Mortality rates showed considerably less variation, however, with white mortality levels generally increasing, albeit slightly, but non-white levels remaining much closer to those of the 1960s.

While the non-white migration loss for the State as a whole was much less during the 1970s than that occurring during the 1960s, whites moved from only a slight loss during the earlier decade to a moderate gain during the latter. At the regional level, changes in white migration patterns over the last two decades have not been as dramatic as those for non-whites. Typically, regional changes for this sector have taken the form of either increased rates of gain or a transition from net losses to net gains. Non-whites, however, while leaving all Alabama regions during the 1960s with greater frequency than those entering, either moved to lower rates of loss or experienced slight to moderate gains during the 1970s. Likewise, at the county level, the magnitude of non-white losses has generally lessened over the last two decades, and the number of counties showing losses has declined

from sixty-five to forty-three. A similar pattern also holds for whites, with forty-two counties showing net migration losses during the 1960s, but only thirteen during the 1970s. Generally, Metropolitan Statistical Areas were experiencing net migration losses among both whites and non-whites in the 1960s. During the 1970s, however, net migration gains occurred in all eight MSAs among both groups except for one metropolitan area each.

The examination of population change components according to white/non-white categories, therefore, reveals that radically changing demographic patterns among non-whites has been the factor most directly responsible for the recent surge in Alabama's growth rate. In particular, the reduction of the huge net migration losses that characterized non-whites during the 1960s, to only a trickle during the 1970s, has had the most immediate and far-reaching effect on the State's demographic complexion. In addition, net migration gains among whites, combined with moderate levels of natural increase for both groups, have also served as important contributing factors in overall growth.

What does the future hold for the State's population? Generally, a continuation of present tendencies is most likely indicated for the foreseeable future. Although some of these trends may not manifest themselves as strongly during the 1980s as in the 1970s, demographic patterns once set in motion tend to achieve at least some semblance of continuity. Fertility rates among both whites and non-whites, reflecting long-term trends in the United States generally, for example, are likely to decline further. The crude death rate, on the other hand, may very well increase. This pattern, due principally to the exigencies of an aging population, should hold particularly true for whites. Significant youthful in-migration involving either group, however, could very well curtail such increases, or actually result in lower death rates.

The greatest uncertainty as to the future direction of Alabama's population involves the question of continued growth through migration. Net migration gains are indicated for the South generally, and Alabama—although probably on a more limited basis than surrounding states—can be expected to share in that growth. Economic considerations, however, will undoubtedly have the greatest impact on prospects for continued movement into the State. Alabama's economic climate is not presently conducive to the relocation of potential migrants and, as a consequence, the excess of in-migrants over out-migrants registered during the 1970s has probably diminished in recent months. With economic recovery, however, this condition could be altered.

TABLE I

POPULATION OF ALABAMA REGIONS, COUNTIES, AND METROPOLITAN STATISTICAL AREAS, 1960, 1970, AND 1980

Region/County/MSA	Population[a] 4/1/60	4/1/70	4/1/80	Average Annual Rate of Change Per Thousand Population[b] 1960-70	1970-80
Tennessee Valley-Sand Mountain	473,060	585,963	669,082	23.9	14.2
Colbert*	46,506	49,632	54,519	6.7	9.8
DeKalb	41,417	41,981	53,658	1.4	27.8
Jackson	36,681	39,202	51,407	6.9	31.1
Lauderdale*	61,622	68,111	80,504	10.5	18.2
Lawrence	24,501	27,281	30,170	11.3	10.6
Limestone**	36,513	41,699	46,005	14.2	10.3
Madison**	117,348	186,540	196,966	59.0	5.6
Marshall**	48,018	54,211	65,622	12.9	21.0
Morgan	60,454	77,306	90,231	27.9	16.7
*Florence MSA	108,128	117,743	135,023	8.9	14.7
**Huntsville MSA	201,879	282,450	308,593	39.9	9.3
Upper Coosa Basin	1,107,130	1,141,304	1,279,993	3.1	12.2
Blount	25,449	26,853	36,459	5.5	35.8
Calhoun*	95,878	103,092	116,936	7.5	13.4
Cherokee	16,303	15,606	18,760	-4.3	20.2
Cullman	45,572	52,445	61,642	15.1	17.5
Etowah**	96,980	94,144	103,057	-2.9	9.5
Jefferson***	634,864	644,991	671,197	1.6	4.1
St. Clair***	25,388	27,956	41,205	10.1	47.4
Shelby***	32,132	38,037	66,298	18.4	74.3
Talladega	65,495	65,280	73,826	-0.3	13.1
Walker***	54,211	56,246	68,660	3.8	22.1
Winston	14,858	16,654	21,953	12.1	31.8
*Anniston MSA	95,878	103,092	116,936	7.5	13.4
**Gadsden MSA	96,980	94,144	103,057	-2.9	9.5
***Birmingham MSA	746,595	767,230	847,360	2.8	10.4

TABLE 1 - CONTINUED

Region/County/MSA	Population[a] 4/1/60	4/1/70	4/1/80	Average Annual Rate of Change Per Thousand Population[b] 1960-70	1970-80
Upper Coastal Plain	294,486	311,650	374,591	5.8	20.2
Autauga*	18,739	24,460	32,259	30.5	31.9
Bibb	14,357	13,812	15,723	-3.8	13.8
Chilton	25,693	25,180	30,612	-2.0	21.6
Elmore*	30,524	33,535	43,390	9.9	29.4
Fayette	16,148	16,252	18,809	0.6	15.7
Franklin	21,988	23,933	28,350	8.8	18.5
Lamar	14,271	14,335	16,453	0.4	14.8
Marion	21,837	23,788	30,041	8.9	26.3
Pickens	21,882	20,326	21,481	-7.1	5.7
Tuscaloosa**	109,047	116,029	137,473	6.4	18.5
*Montgomery MSA[c]	-	-	-	-	-
**Tuscaloosa MSA	109,047	116,029	137,473	6.4	18.5
Piedmont	176,103	184,089	211,900	4.5	15.1
Chambers	37,828	36,356	39,191	-3.9	7.8
Clay	12,400	12,636	13,703	1.9	8.4
Cleburne	10,911	10,996	12,595	0.8	14.5
Coosa	10,726	10,662	11,377	-0.6	6.7
Lee	49,754	61,268	76,283	23.1	24.5
Randolph	19,477	18,331	20,075	-5.9	9.5
Tallapoosa	35,007	33,840	38,676	-3.3	14.3

TABLE 1 - CONTINUED

Region/County/MSA	Population[a] 4/1/60	4/1/70	4/1/80	Average Annual Rate of Change Per Thousand Population[b] 1960-70	1970-80
Black Belt	397,846	371,670	400,044	-6.6	7.6
Bullock	13,462	11,824	10,596	-12.2	-10.4
Dallas	56,667	55,296	53,981	-2.4	-2.4
Greene	13,600	10,650	11,021	-21.7	3.5
Hale	19,537	15,888	15,604	-18.7	-1.8
Lowndes	15,417	12,897	13,253	-16.3	2.8
Macon	26,717	24,841	26,829	-7.0	8.0
Marengo	27,098	23,819	25,047	-12.1	5.2
Montgomery*	169,210	167,790	197,038	-0.8	17.4
Perry	17,358	15,388	15,012	-11.3	-2.4
Sumter	20,041	16,974	16,908	-15.3	-0.4
Wilcox	18,739	16,303	14,755	-13.0	-9.5
*Montgomery MSA[d]	218,473	225,785	272,687	3.3	20.8
Central Coastal Plain-Wire Grass	421,215	437,893	473,240	4.0	8.1
Barbour	24,700	22,543	24,756	-8.7	9.8
Butler	24,560	22,007	21,680	-10.4	-1.5
Choctaw	17,870	16,589	16,839	-7.2	1.5
Clarke	25,738	26,724	27,702	3.8	3.7
Coffee	30,583	34,872	38,533	14.0	10.5
Conecuh	17,762	15,645	15,884	-11.9	1.5
Covington	35,631	34,079	36,850	-4.4	8.1
Crenshaw	14,909	13,188	14,110	-11.5	7.0
Dale	31,066	52,938	47,821	70.4	-9.7
Geneva	22,310	21,924	24,253	-1.7	10.6

TABLE 1 - CONTINUED

Region/County/MSA	Population[a] 4/1/60	4/1/70	4/1/80	Average Annual Rate of Change Per Thousand Population[b] 1960-70	1970-80
Henry	15,286	13,254	15,302	-13.3	15.5
Houston	50,718	56,574	74,632	11.5	31.9
Monroe	22,372	20,883	22,651	-6.7	8.5
Pike	25,987	25,038	28,050	-3.7	12.0
Russell[e]	46,351	45,394	47,356	-2.1	4.3
Washington	15,372	16,241	16,821	5.7	3.6
Gulf Coast	396,900	411,596	481,211	3.7	16.9
Baldwin*	49,088	59,382	78,440	21.0	32.1
Escambia	33,511	34,906	38,392	4.2	10.0
Mobile*	314,301	317,308	364,379	1.0	14.8
*Mobile MSA	363,389	376,690	442,819	3.7	17.6
Total--MSA Counties	1,986,720	2,128,557	2,411,304	7.1	13.3
Total--Non-MSA Counties	1,280,020	1,315,608	1,478,757	2.8	12.4
Total--Alabama	3,266,740	3,444,165	3,890,061	5.4	12.9

[a]Population data for 1960 and 1970 were drawn from regular decennial census counts. Data for 1980 were derived from the Bureau of the Census's "Advance Report" for Alabama and, at the time the research was undertaken, represented the latest population counts.

[b]Average annual rate per thousand 1960 population for the 1960-70 decade and average annual rate per thousand 1970 population for the 1970-80 decade. Note: The average annual rate of change per thousand population (1960 to 1970 or 1970 to 1980) is equal to the same value as the overall percentage change in population (from 1960 to 1970 or 1970 to 1980).

[c]Data for Autauga and Elmore counties (Upper Coastal Plain) are combined with Montgomery County (Black Belt). Totals for the Montgomery MSA are reported following the data for the Black Belt region.

[d]Includes combined data for Autauga, Elmore, and Montgomery counties.

[e]Part of the Columbus, Georgia MSA.

TABLE 2

POPULATION OF ALABAMA REGIONS, COUNTIES, AND METROPOLITAN STATISTICAL AREAS, 1960, 1970, AND 1980, BY RACE

Region/County/MSA	Population[a] 4/1/60 W	4/1/60 NW	4/1/70 W	4/1/70 NW	4/1/80 W	4/1/80 NW	Average Annual Rate of Change Per Thousand Population[b] 1960-70 W	1960-70 NW	1970-80 W	1970-80 NW
Tennessee Valley-Sand Mountain	409,819	63,241	517,803	68,160	583,791	85,291	26.3	7.8	12.7	25.1
Colbert*	37,524	8,982	41,105	8,527	45,209	9,310	9.5	-5.1	10.0	9.2
DeKalb	40,596	821	41,123	858	52,538	1,120	1.3	4.5	27.8	30.5
Jackson	34,443	2,238	37,175	2,027	48,990	2,417	7.9	-9.4	31.8	19.2
Lauderdale*	54,355	7,267	60,866	7,245	72,333	8,171	12.0	-0.3	18.8	12.8
Lawrence	19,033	5,468	22,161	5,120	25,013	5,157	16.4	-6.4	12.9	0.7
Limestone**	28,884	7,629	34,528	7,171	39,351	6,654	19.5	-6.0	14.0	-7.2
Madison**	95,283	22,065	157,804	28,736	154,782	42,184	65.6	30.2	-1.9	46.8
Marshall**	46,894	1,124	53,037	1,174	64,444	1,178	13.1	4.4	21.5	0.3
Morgan	52,807	7,647	70,004	7,302	81,131	9,100	32.6	-4.5	15.9	24.6
*Florence MSA	91,879	16,249	101,971	15,772	117,542	17,481	11.0	-2.9	15.3	10.8
**Huntsville MSA	171,061	30,818	245,369	37,081	258,577	50,016	43.4	20.3	5.4	34.9
Upper Coosa Basin	814,147	292,983	864,925	276,379	974,519	305,474	6.2	-5.7	12.7	10.5
Blount	24,613	836	26,205	648	35,761	698	6.5	-22.5	36.5	7.7
Calhoun*	77,805	18,073	85,186	17,906	95,336	21,600	9.5	-0.9	11.9	20.6
Cherokee	14,610	1,693	14,199	1,407	17,185	1,575	-2.8	-16.9	21.0	11.9
Cullman	45,051	521	51,872	573	60,928	714	15.1	10.0	17.5	24.6
Etowah**	81,982	14,998	81,010	13,134	88,806	14,251	-1.2	-12.4	9.6	8.5

TABLE 2 - CONTINUED

Region/County/MSA	Population[a] 4/1/60 W	4/1/60 NW	4/1/70 W	4/1/70 NW	4/1/80 W	4/1/80 NW	Average Annual Rate of Change Per Thousand Population[b] 1960-70 W	1960-70 NW	1970-80 W	1970-80 NW
Jefferson***	415,035	219,829	437,433	207,558	444,299	226,898	5.4	-5.6	1.6	9.3
St. Clair***	21,116	4,272	24,043	3,913	36,935	4,270	13.9	-8.4	53.6	9.1
Shelby***	26,049	6,083	31,568	6,469	58,982	7,316	21.2	6.3	86.8	13.1
Talladega	44,525	20,970	45,180	20,100	50,922	22,904	1.5	-4.1	12.7	14.0
Walker***	48,584	5,627	51,635	4,611	63,547	5,113	6.3	-18.1	23.1	10.9
Winston	14,777	81	16,594	60	21,818	135	12.3	-25.9	31.5	125.0
*Anniston MSA	77,805	18,073	85,186	17,906	95,336	21,600	9.5	-0.9	11.9	20.6
**Gadsden MSA	81,982	14,998	81,010	13,134	88,806	14,251	-1.2	-12.4	9.6	8.5
***Birmingham MSA	510,784	235,811	544,679	222,551	603,763	243,597	6.6	-5.6	10.8	9.5
Upper Coastal Plain	220,034	74,452	245,205	66,445	296,165	78,426	11.4	-10.8	20.8	18.0
Autauga*	10,839	7,900	17,511	6,949	24,814	7,445	61.6	-12.0	41.7	7.1
Bibb	9,940	4,417	9,953	3,859	12,029	3,694	0.1	-12.6	20.9	-4.3
Chilton	21,615	4,078	21,762	3,418	26,942	3,670	0.7	-16.2	23.8	7.4
Elmore*	20,221	10,303	24,045	9,490	33,585	9,805	18.9	-7.9	39.7	3.3
Fayette	13,574	2,574	13,989	2,263	16,378	2,431	3.1	-12.1	17.1	7.4
Franklin	20,756	1,232	22,728	1,205	26,991	1,359	9.5	-2.2	18.8	12.8
Lamar	12,168	2,103	12,366	1,969	14,458	1,995	1.6	-6.4	16.9	1.3
Marion	21,104	733	23,106	682	29,250	791	9.5	-7.0	26.6	16.0
Pickens	12,098	9,784	11,854	8,472	12,451	9,030	-2.0	-13.4	5.0	6.6
Tuscaloosa**	77,719	31,328	87,891	28,138	99,267	38,206	13.1	-10.2	12.9	35.8
*Montgomery MSA[c]	-	-	-	-	-	-	-	-	-	-
**Tuscaloosa MSA	77,719	31,328	87,891	28,138	99,267	38,206	13.1	-10.2	12.9	35.8

TABLE 2 - CONTINUED

Region/County/MSA	Population[a] 4/1/60 W	4/1/60 NW	4/1/70 W	4/1/70 NW	4/1/80 W	4/1/80 NW	Average Annual Rate of Change Per Thousand Population[b] 1960-70 W	1960-70 NW	1970-80 W	1970-80 NW
Piedmont	122,237	53,866	134,344	49,745	156,120	55,780	9.9	-7.7	16.2	12.1
Chambers	23,959	13,869	23,695	12,661	25,722	13,969	-1.1	-8.7	6.4	10.3
Clay	10,372	2,028	10,578	2,058	11,424	2,279	2.0	1.5	8.0	10.7
Cleburne	10,212	699	10,346	650	11,925	670	1.3	-7.0	15.3	3.1
Coosa	6,847	3,879	6,906	3,756	7,411	3,966	0.9	-3.2	7.3	5.6
Lee	31,458	18,296	44,109	17,159	56,869	19,414	40.2	-6.2	28.9	13.1
Randolph	14,501	4,976	14,245	4,086	15,173	4,902	-1.8	-17.9	6.5	20.0
Tallapoosa	24,888	10,119	24,465	9,375	28,096	10,580	-1.7	-7.4	14.8	12.9
Black Belt	172,964	224,882	180,169	191,501	188,416	211,628	4.2	-14.8	4.6	10.5
Bullock	3,781	9,681	3,857	7,967	3,427	7,169	2.0	-17.7	-11.1	-10.0
Dallas	23,952	32,715	26,330	28,966	24,205	29,776	9.9	-11.5	-8.1	2.8
Greene	2,546	11,054	2,619	8,031	2,405	8,616	2.9	-27.3	-8.2	7.3
Hale	5,726	13,811	5,336	10,552	5,774	9,830	-6.8	-23.6	8.2	-6.8
Lowndes	2,978	12,439	2,976	9,921	3,304	9,949	-0.1	-20.2	11.0	0.3
Macon	4,405	22,312	4,545	20,296	4,034	22,795	3.2	-9.0	-11.2	12.3
Marengo	10,264	16,834	10,640	13,179	11,663	13,384	3.7	-21.7	9.6	1.6
Montgomery*	104,485	64,725	106,670	61,120	117,894	79,144	2.1	-5.6	10.5	29.5
Perry	5,94[illegible]	11,415	6,332	9,056	5,970	9,042	6.5	-20.7	-5.7	-0.2
Sumter	4,743	15,298	5,724	11,250	5,150	11,758	20.7	-26.5	-10.0	4.5
Wilcox	4,141	14,598	5,140	11,163	4,590	10,165	24.1	-23.5	-10.7	-8.9
*Montgomery MSA[d]	135,545	82,928	148,226	77,559	176,293	96,394	9.4	-6.5	18.9	24.3

TABLE 2 - CONTINUED

Region/County/MSA	Population[a] 4/1/60 W	4/1/60 NW	4/1/70 W	4/1/70 NW	4/1/80 W	4/1/80 NW	Average Annual Rate of Change Per Thousand Population[b] 1960-70 W	1960-70 NW	1970-80 W	1970-80 NW
Central Coastal Plain-Wire Grass	270,724	150,491	304,917	132,976	332,807	140,433	12.6	-11.6	9.1	5.6
Barbour	11,850	12,850	12,134	10,409	13,693	11,063	2.4	-19.0	12.8	6.3
Butler	13,575	10,985	13,174	8,833	13,260	8,420	-3.0	-19.6	0.7	-4.7
Choctaw	9,012	8,858	9,276	7,313	9,490	7,349	2.9	-17.4	2.3	0.5
Clarke	12,987	12,751	15,008	11,716	15,806	11,896	15.6	-8.1	5.3	1.5
Coffee	24,220	6,363	28,853	6,019	31,636	6,897	19.1	-5.4	9.6	14.6
Conecuh	9,674	8,088	8,654	6,991	9,311	6,573	-10.5	-13.6	7.6	-6.0
Covington	29,880	5,751	29,015	5,064	31,918	4,932	-2.9	-11.9	10.0	-2.6
Crenshaw	10,266	4,643	9,386	3,802	10,372	3,738	-8.6	-18.1	10.5	-1.7
Dale	25,459	5,607	45,817	7,121	38,744	9,077	80.0	27.0	-15.4	27.5
Geneva	18,945	3,365	19,029	2,895	21,019	3,234	0.4	-14.0	10.5	11.7
Henry	8,321	6,965	7,907	5,347	9,473	5,829	-5.0	-23.2	19.8	9.0
Houston	36,832	13,886	43,069	13,505	57,403	17,229	16.9	-2.7	33.3	27.6
Monroe	11,030	11,342	11,314	9,569	12,749	9,902	2.6	-15.6	12.7	3.5
Pike	15,242	10,745	16,367	8,671	18,109	9,941	7.4	-19.3	10.6	14.6
Russell[e]	23,365	22,986	24,599	20,795	28,544	18,812	5.3	-9.5	16.0	-9.5
Washington	10,066	5,306	11,315	4,926	11,280	5,541	12.4	-7.2	-0.3	12.5

TABLE 2 - CONTINUED

Region/County/MSA	Population[a] 4/1/60 W	4/1/60 NW	4/1/70 W	4/1/70 NW	4/1/80 W	4/1/80 NW	Average Annual Rate of Change Per Thousand Population[b] 1960-70 W	1960-70 NW	1970-80 W	1970-80 NW
Gulf Coast	273,684	123,216	286,468	125,128	337,870	143,341	4.7	1.6	17.9	14.6
Baldwin*	38,759	10,329	48,650	10,732	65,723	12,717	25.5	3.9	35.1	18.5
Escambia	22,052	11,459	23,748	11,158	26,008	12,384	7.7	-2.6	9.5	11.0
Mobile*	212,873	101,428	214,070	103,238	246,139	118,240	0.6	1.8	15.0	14.5
*Mobile MSA	251,632	111,757	262,720	113,970	311,862	130,957	4.4	2.0	18.7	14.9
Total--MSA Counties	1,421,772	564,948	1,581,651	546,906	1,779,990	631,314	11.2	-3.2	12.5	15.4
Total--Non-MSA Counties	861,837	418,183	952,180	363,428	1,089,698	389,059	10.5	-13.1	14.4	7.1
Total--Alabama	2,283,609	983,131	2,533,831	910,334	2,869,688	1,020,373	11.0	-7.4	13.3	12.1

[a]See footnote a, Table 1.

[b]See footnote b, Table 1.

[c]See footnote c, Table 1.

[d]See footnote d, Table 1.

[e]See footnote e, Table 1.

TABLE 3

COMPONENTS OF POPULATION CHANGE FOR ALABAMA REGIONS, COUNTIES, AND METROPOLITAN STATISTICAL AREAS, 1960 TO 1970 AND 1970 TO 1980

Region/County/MSA	Average Annual Rate Per Thousand Population[a]					
	Birth Rate[b]		Death Rate[b]		Net Migration Rate[b]	
	1960-70	1970-80	1960-70	1970-80	1960-70	1970-80
Tennessee Valley-Sand Mountain	25.5	16.7	9.0	8.5	7.4	6.0
Colbert*	21.9	15.7	9.3	9.6	-5.9	3.7
DeKalb	18.5	17.6	9.7	11.3	-7.5	21.5
Jackson	20.4	19.9	9.8	10.7	-3.8	21.9
Lauderdale*	21.9	15.4	8.4	9.0	-3.0	11.8
Lawrence	24.6	18.4	8.9	8.9	-4.4	1.1
Limestone**	24.6	16.9	9.3	9.1	-1.1	2.5
Madison**	34.3	15.6	8.1	6.2	32.8	-3.9
Marshall**	22.5	16.9	9.7	10.3	0.1	14.5
Morgan	26.0	18.1	9.9	8.7	11.8	7.4
*Florence MSA	21.9	15.6	8.8	9.3	-4.2	8.4
**Huntsville MSA	29.7	16.1	8.7	7.4	18.9	0.6
Upper Coosa Basin	20.1	16.9	9.8	10.3	-7.2	5.5
Blount	18.3	16.6	10.0	10.2	-2.8	29.4
Calhoun*	22.1	17.7	8.8	9.2	-5.8	5.0
Cherokee	16.7	15.6	9.5	11.4	-11.5	16.0
Cullman	19.6	16.0	9.8	9.7	5.3	11.2
Etowah**	18.7	16.5	9.1	10.7	-12.6	3.7
Jefferson***	19.7	15.9	9.9	10.2	-8.2	-1.7
St. Clair***	20.8	20.6	10.4	11.4	-0.2	38.2
Shelby***	22.6	22.8	10	10.3	6.3	61.9
Talladega	22.7	19.8	10.0	10.2	-13.1	3.5
Walker***	20.6	18.8	10.7	12.1	-6.1	15.3
Winston	21.0	20.1	12.2	12.6	3.4	24.3
*Anniston MSA	22.1	17.7	8.8	9.2	-5.8	5.0
**Gadsden MSA	18.7	16.5	9.1	10.7	-12.6	3.7
***Birmingham MSA	19.9	16.6	10.0	10.3	-7.1	4.2

TABLE 3 - CONTINUED

Region/County/MSA	Average Annual Rate Per Thousand Population[a]					
	Birth Rate[b]		Death Rate[b]		Net Migration Rate[b]	
	1960-70	1970-80	1960-70	1970-80	1960-70	1970-80
Upper Coastal Plain	20.6	17.8	9.8	10.4	-5.0	12.8
Autauga*	26.1	20.1	11.5	9.2	15.9	21.0
Bibb	21.6	18.1	11.2	11.8	-14.1	7.6
Chilton	18.8	17.8	11.0	12.8	-9.8	16.6
Elmore*	22.8	19.7	10.8	11.1	-2.2	20.8
Fayette	17.7	14.8	10.8	11.2	-6.2	12.1
Franklin	21.0	17.5	11.0	12.0	-1.1	13.0
Lamar	17.8	16.9	11.2	12.4	-6.2	10.3
Marion	19.0	16.7	10.2	11.6	0.2	21.2
Pickens	21.1	17.8	9.8	10.9	-18.3	-1.2
Tuscaloosa**	20.4	17.4	8.0	8.7	-5.9	9.7
*Montgomery MSA[c]	-	-	-	-	-	-
**Tuscaloosa MSA	20.4	17.4	8.0	8.7	-5.9	9.7
Piedmont	21.0	17.4	10.4	10.2	-6.1	7.9
Chambers	20.2	17.2	10.7	11.4	-13.4	2.0
Clay	19.1	17.4	11.8	12.2	-5.3	3.3
Cleburne	18.1	15.4	10.0	9.9	-7.3	9.0
Coosa	18.0	16.0	10.6	11.1	-7.9	1.8
Lee	24.1	17.4	8.9	7.4	7.9	14.6
Randolph	19.2	18.4	11.8	12.5	-13.3	3.6
Tallapoosa	21.1	18.3	11.1	12.0	-13.3	7.9
Black Belt	22.6	19.6	10.4	10.8	-18.7	-1.1
Bullock	22.1	19.3	12.7	12.4	-21.6	-17.2
Dallas	27.1	22.6	11.2	10.5	-18.3	-14.4
Greene	21.5	19.3	11.0	13.3	-32.2	-2.5
Hale	23.6	19.0	11.0	12.5	-31.3	-8.4
Lowndes	25.7	23.2	9.9	10.0	-32.2	-10.4
Macon	18.1	17.4	10.3	11.5	-14.8	2.1

TABLE 3 - CONTINUED

Region/County/MSA	Average Annual Rate Per Thousand Population[a]					
	Birth Rate[b]		Death Rate[b]		Net Migration Rate[b]	
	1960-70	1970-80	1960-70	1970-80	1960-70	1970-80
Marengo	24.4	19.9	11.4	11.6	-25.1	-3.2
Montgomery*	21.2	18.6	9.6	10.2	-12.5	9.0
Perry	21.0	18.1	10.1	11.3	-22.2	-9.2
Sumter	21.6	19.7	11.2	11.6	-25.8	-8.5
Wilcox	24.1	21.8	11.4	10.9	-25.7	-20.4
*Montgomery MSA[d]	21.9	19.0	9.9	10.2	-8.6	12.1
Central Coastal Plain-Wire Grass	23.0	18.9	10.5	10.4	-8.5	-0.5
Barbour	22.0	19.0	11.7	12.2	-19.0	3.0
Butler	20.9	17.5	11.0	12.2	-20.2	-6.5
Choctaw	22.7	19.2	10.2	10.0	-19.7	-7.8
Clarke	24.7	20.7	10.5	10.1	-10.4	-6.9
Coffee	23.3	18.5	8.8	8.8	-0.4	0.8
Conecuh	19.6	17.0	10.6	12.0	-21.0	-3.4
Covington	19.0	16.4	11.9	12.7	-11.5	4.4
Crenshaw	16.3	16.6	12.3	14.0	-15.5	4.4
Dale	33.1	19.5	8.5	5.5	45.8	-23.6
Geneva	19.0	16.3	10.2	11.4	-10.5	5.7
Henry	19.6	19.8	11.0	12.9	-21.8	8.6
Houston	22.8	21.5	10.3	10.1	-1.0	20.6
Monroe	23.3	20.5	9.6	10.6	-20.3	-1.4
Pike	22.1	18.0	12.4	11.1	-13.4	5.2
Russell[e]	26.5	19.1	10.7	11.2	-17.9	-3.6
Washington	24.0	18.7	8.5	9.5	-9.8	-5.6

TABLE 3 - CONTINUED

Region/County/MSA	Average Annual Rate Per Thousand Population[a]					
	Birth Rate[b]		Death Rate[b]		Net Migration Rate[b]	
	1960-70	1970-80	1960-70	1970-80	1960-70	1970-80
Gulf Coast	24.1	19.8	8.8	9.4	-11.6	6.5
Baldwin*	23.3	19.1	10.1	10.4	7.8	23.4
Escambia	24.0	19.2	10.3	10.1	-9.6	0.9
Mobile*	24.2	20.0	8.4	9.1	-14.9	4.0
*Mobile MSA	24.1	19.8	8.6	9.3	-11.8	7.0
Total--MSA Counties	22.2	17.4	9.3	9.6	-5.7	5.4
Total--Non-MSA Counties	22.0	18.5	10.4	10.5	-8.8	4.4
Total--Alabama	22.1	17.9	9.8	10.0	-6.9	5.0

[a]Average annual rate (i.e., birth, death, or net migration rate) per thousand 1960 population for the 1960-70 decade and average annual rate per thousand 1970 population for the 1970-80 decade.

[b]Average annual birth, death, and net migration rates for the time periods utilized are based on data drawn from A Quarter Century of Vital Events (1947-1971) and annual editions of Alabama's Vital Events, both published by the Alabama Department of Public Health, Division of Vital Statistics. Average annual migration rates for each of the two decades were derived through the formula

$$\frac{(P_{T2} - P_{T1}) - (B-D)}{P_{T1}} / 10 \times 1{,}000.$$

[c] See footnote c, Table 1.

[d] See footnote d, Table 1.

[e] See footnote e, Table 1.

TABLE 4

COMPONENTS OF POPULATION CHANGE FOR ALABAMA REGIONS, COUNTIES, AND METROPOLITAN STATISTICAL AREAS, 1960 to 1970 AND 1970 to 1980, BY RACE

	Average Annual Rate Per Thousand Population[a]											
	Birth Rate[b]				Death Rate[b]				Net Migration Rate[b]			
	1960-70		1970-80		1960-70		1970-80		1960-70		1970-80	
Region/County/MSA	W	NW	W	NW	W	NW	W	NW	W	NW	W	NW
Tennessee Valley-Sand Mountain	24.8	30.1	15.7	23.9	8.6	11.7	8.3	10.4	10.2	-10.6	5.3	11.6
Colbert*	20.8	26.7	14.6	21.2	8.7	12.1	9.1	12.0	-2.6	-19.7	4.5	0.0
DeKalb	18.3	31.4	17.4	24.0	9.5	15.6	11.3	12.1	-7.4	-11.3	21.6	18.6
Jackson	20.2	23.4	19.8	22.4	9.8	10.0	10.7	11.5	-2.6	-22.8	22.7	8.3
Lauderdale*	21.1	27.9	14.7	21.3	7.9	12.0	8.8	11.4	-1.2	-16.2	12.9	2.8
Lawrence	23.1	29.9	16.5	26.4	8.5	10.3	8.5	10.7	1.8	-26.0	4.8	-14.9
Limestone**	23.7	28.2	16.5	18.5	8.8	11.2	8.9	10.0	4.7	-23.0	6.3	-15.7
Madison**	34.3	34.2	13.8	25.8	7.3	11.3	5.7	8.7	38.7	7.3	-10.0	29.7
Marshall**	22.4	26.5	16.9	18.0	9.6	13.7	10.3	11.0	0.3	-8.4	14.9	-6.6
Morgan	25.6	28.7	17.1	27.5	9.3	13.7	8.1	14.2	16.4	-19.5	6.9	11.3
*Florence MSA	21.0	27.2	14.7	21.3	8.2	12.0	8.9	11.7	-1.8	-18.1	9.5	1.3
**Huntsville MSA	29.2	32.7	14.3	24.3	8.2	11.3	6.3	9.0	22.4	-0.5	-7.1	20.7
Upper Coosa Basin	18.8	23.7	15.6	21.0	9.1	11.7	9.8	11.7	-3.4	-17.6	6.9	1.2
Blount	18.1	23.7	16.4	21.3	10.0	11.4	10.2	9.6	-1.7	-34.8	30.2	-4.0
Calhoun*	20.9	27.7	16.3	24.0	8.2	11.3	8.9	10.5	-3.2	-17.3	4.5	7.1
Cherokee	15.8	24.7	15.0	22.4	9.6	8.6	11.6	9.5	-9.0	-33.0	17.6	-1.0
Cullman	19.5	24.6	15.9	19.9	9.8	13.4	9.7	6.3	5.4	-1.2	11.2	11.0

TABLE 4 - CONTINUED

Region/County/MSA	Average Annual Rate Per Thousand Population[a]											
	Birth Rate[b]				Death Rate[b]				Net Migration Rate[b]			
	1960-70		1970-80		1960-70		1970-80		1960-70		1970-80	
	W	NW	W	NW	W	NW	W	NW	W	NW	W	NW
Etowah**	17.6	24.8	15.5	22.6	8.7	11.3	10.4	12.8	-10.1	-25.9	4.5	-1.3
Jefferson***	18.3	22.3	14.0	20.0	8.9	11.8	9.3	12.0	-4.0	-16.1	-3.1	1.3
St. Clair***	19.3	28.3	19.8	25.4	10.2	11.3	11.6	10.5	4.8	-25.3	45.4	-5.8
Shelby***	19.6	35.4	22.7	23.2	10.1	12.5	10.2	10.7	11.6	-16.6	74.4	0.6
Talladega	19.5	29.6	16.7	26.7	9.7	10.7	10.4	9.9	-8.4	-23.1	6.4	-2.9
Walker***	20.3	22.6	18.5	22.0	10.3	14.6	11.8	15.1	-3.8	-26.0	16.3	3.9
Winston	20.9	28.4	20.1	28.3	12.2	17.3	12.5	31.7	3.6	-37.0	23.9	128.3
*Anniston MSA	20.9	27.7	16.3	24.0	8.2	11.3	8.9	10.5	-3.2	-17.3	4.5	7.1
**Gadsden MSA	17.6	24.8	15.5	22.6	8.7	11.3	10.4	12.8	-10.1	-25.9	4.5	-1.3
***Birmingham MSA	18.6	22.7	15.2	20.2	9.1	11.9	9.7	12.0	-2.8	-16.5	5.4	1.2
Upper Coastal Plain												
Autauga*	18.4	27.3	15.5	25.9	9.4	10.9	10.1	11.4	2.4	-27.2	15.3	3.5
Bibb	24.0	29.0	18.2	25.0	11.1	12.1	8.3	11.5	48.6	-28.9	31.8	-6.3
Chilton	18.1	29.2	16.4	22.4	11.1	11.6	12.1	11.0	-6.9	-30.3	16.5	-15.7
Elmore*	17.2	27.1	16.3	27.4	10.9	11.1	12.8	12.9	-5.6	-32.2	20.3	-7.1
Fayette	18.0	32.3	17.4	25.5	10.5	11.4	11.1	11.0	11.3	-28.8	33.4	-11.2
Franklin	16.2	25.2	14.2	18.7	10.6	11.7	11.4	10.3	-2.6	-25.6	14.2	-1.0
Lamar	20.7	25.8	17.3	21.6	11.0	11.0	12.0	13.4	-0.1	-17.0	13.4	4.6
	16.8	23.5	16.1	21.6	11.1	11.7	12.6	11.6	-4.1	-18.2	13.4	-8.7

TABLE 4 - CONTINUED

Region/County/MSA	Average Annual Rate Per Thousand Population[a]											
	Birth Rate[b]				Death Rate[b]				Net Migration Rate[b]			
	1960-70		1970-80		1960-70		1970-80		1960-70		1970-80	
	W	NW	W	NW	W	NW	W	NW	W	NW	W	NW
Marion	18.7	26.7	16.4	25.7	10.2	11.2	11.5	14.5	0.9	-22.5	21.6	4.8
Pickens	16.5	26.7	12.6	25.1	9.4	10.4	10.9	10.9	-9.1	-29.7	3.4	-7.6
Tuscaloosa**	18.3	25.6	14.0	28.0	7.1	10.3	7.8	11.5	1.9	-25.5	6.7	19.3
*Montgomery MSA[c]	-	-	-	-	-	-	-	-	-	-	-	-
**Tuscaloosa MSA	18.3	25.6	14.0	28.0	7.1	10.3	7.8	11.5	1.9	-25.5	6.7	19.3
Piedmont	17.9	28.3	14.6	25.1	10.0	11.4	9.8	11.4	2.1	-24.6	11.4	-1.6
Chambers	15.5	28.4	13.5	24.3	10.5	11.0	11.8	10.6	-6.0	-26.1	4.8	-3.3
Clay	16.2	34.0	15.1	29.3	12.1	10.7	12.6	10.3	-2.1	-21.8	5.5	-8.3
Cleburne	17.4	28.8	14.9	24.6	9.9	12.3	9.8	11.8	-6.2	-23.5	10.2	-9.7
Coosa	12.7	27.2	12.2	23.2	11.3	9.5	12.0	9.5	-0.6	-20.9	7.1	-8.0
Lee	22.0	27.8	15.3	22.9	7.2	11.9	5.9	11.5	25.4	-22.1	19.5	1.8
Randolph	16.0	28.6	14.5	32.2	11.6	12.3	12.1	13.8	-6.1	-34.2	4.1	1.5
Tallapoosa	18.3	28.0	15.0	27.0	11.0	11.4	11.9	12.1	-9.0	-24.0	11.7	-2.1
Black Belt	17.9	26.1	14.5	24.4	9.1	11.4	9.7	11.9	-4.6	-29.5	-0.2	-2.0
Bullock	15.3	24.8	12.0	22.8	13.9	12.2	12.1	12.6	0.6	-30.3	-11.0	-20.2
Dallas	24.7	28.9	19.0	25.7	9.0	12.8	9.0	11.8	-5.7	-27.6	-18.0	-11.1
Greene	14.2	23.2	8.7	22.7	12.6	10.7	14.1	13.0	1.3	-39.9	-2.7	-2.5
Hale	13.4	27.9	12.3	22.5	11.0	10.9	13.2	12.1	-9.1	-40.5	9.1	-17.2

TABLE 4 - CONTINUED

Region/County/MSA	Average Annual Rate Per Thousand Population[a]											
	Birth Rate[b]				Death Rate[b]				Net Migration Rate[b]			
	1960-70		1970-80		1960-70		1970-80		1960-70		1970-80	
	W	NW	W	NW	W	NW	W	NW	W	NW	W	NW
Lowndes	15.0	28.2	15.2	25.5	12.1	9.3	13.4	9.0	-3.0	-39.2	9.2	-16.2
Macon	16.3	18.4	12.2	18.6	12.6	9.9	12.0	11.4	-0.5	-17.6	-11.4	5.1
Marengo	20.5	26.7	15.0	23.9	9.9	12.3	10.1	12.8	-7.0	-36.1	4.7	-9.5
Montgomery*	17.0	28.0	14.1	26.5	8.2	12.0	9.1	12.2	-6.8	-21.6	5.5	15.1
Perry	15.4	23.9	10.7	23.3	10.0	10.2	10.2	12.1	1.1	-34.3	-6.2	-11.4
Sumter	15.6	23.5	13.0	23.1	11.7	11.0	10.3	12.3	16.8	-39.0	-12.8	-6.3
Wilcox	16.8	26.1	14.7	25.0	13.2	10.9	11.6	10.6	20.6	-38.8	-13.8	-23.4
*Montgomery MSA[d]	17.7	28.7	15.1	26.3	8.7	11.9	9.3	12.0	0.4	-23.2	13.1	10.0
Central Coastal Plain-Wire Grass	20.3	27.7	16.4	24.7	10.2	11.0	10.1	11.0	2.5	-28.4	2.8	-8.1
Barbour	17.5	26.1	14.4	24.3	11.7	11.7	12.0	12.4	-3.5	-33.3	10.5	-5.7
Butler	15.6	27.4	12.8	24.7	11.9	9.9	12.7	11.3	-6.6	-37.0	0.6	-18.1
Choctaw	20.2	25.3	15.6	23.8	9.6	10.8	9.1	11.0	-7.7	-32.0	-4.2	-12.3
Clarke	21.1	28.4	15.9	26.8	10.1	10.9	10.1	10.1	4.5	-25.6	-0.4	-15.2
Coffee	22.0	28.1	17.0	25.6	8.6	9.6	8.5	10.3	5.8	-23.9	1.1	-0.7
Conecuh	15.1	25.1	13.4	21.3	11.0	10.2	13.0	10.8	-14.7	-28.4	7.2	-16.5
Covington	17.1	29.1	14.7	26.0	11.6	13.7	12.6	13.1	-8.4	-27.3	7.9	-15.5
Crenshaw	13.3	23.0	14.0	23.0	12.9	11.0	14.4	12.9	-8.9	-30.2	10.9	-11.8
Dale	33.7	30.2	18.2	27.7	8.1	10.2	5.2	7.8	55.4	7.0	-28.5	7.6

TABLE 4 - CONTINUED

Region/County/MSA	Average Annual Rate Per Thousand Population[a]											
	Birth Rate[b]				Death Rate[b]				Net Migration Rate[b]			
	1960-70		1970-80		1960-70		1970-80		1960-70		1970-80	
	W	NW	W	NW	W	NW	W	NW	W	NW	W	NW
Geneva	17.2	28.9	14.5	28.3	9.9	12.3	11.2	12.9	-6.9	-30.6	7.1	-3.6
Henry	15.2	24.8	15.7	25.8	11.5	10.4	13.5	12.1	-8.7	-37.6	17.6	-4.7
Houston	20.3	29.4	19.1	29.1	9.7	11.9	9.7	11.7	6.3	-20.2	23.8	10.2
Monroe	17.9	28.5	16.6	25.0	9.9	9.3	11.0	10.1	-5.4	-26.0	7.1	-11.4
Pike	18.0	28.0	14.0	25.5	11.3	13.9	10.2	12.8	0.7	-33.4	6.9	2.0
Russell[e]	23.7	29.5	18.3	20.2	10.3	11.1	11.9	10.3	-8.1	-27.9	9.7	-19.4
Washington	22.1	27.6	16.3	24.0	8.7	8.1	9.7	9.0	-1.0	-26.6	-7.0	-2.6
Gulf Coast	21.6	29.6	17.8	24.4	8.2	10.0	9.1	10.0	-8.7	-18.0	9.3	0.2
Baldwin*	20.9	32.1	17.4	26.9	10.0	10.7	10.6	9.3	14.5	-17.5	28.3	0.9
Escambia	22.6	26.8	17.8	22.3	10.1	10.6	10.0	10.4	-4.8	-18.9	1.8	-0.9
Mobile*	21.6	29.7	17.9	24.4	7.7	9.9	8.7	10.0	-13.4	-18.0	5.8	0.2
*Mobile MSA	21.5	29.9	17.8	24.6	8.0	10.0	9.1	10.0	-9.1	-17.9	10.0	0.3
Total--MSA Counties	20.6	26.3	15.6	22.9	8.6	11.3	9.0	11.2	-0.8	-18.2	6.0	3.8
Total--Non-MSA Counties	19.6	26.8	16.2	24.6	10.1	11.1	10.2	11.4	0.9	-28.8	8.4	-6.2
Total--Alabama	20.2	26.5	15.8	23.5	9.1	11.3	9.5	11.3	-0.1	-22.7	6.9	-0.2

[a]See footnote a, Table 3.
[b]See footnote b, Table 3.
[c]See footnote c, Table 1.
[d]See footnote d, Table 1.
[e]See footnote e, Table 1.

Footnotes/References

1. The regional configurations utilized in the present report are based primarily on those developed by Bogue and Beale. See Donald J. Bogue and Calvin L. Beale, *Economic Areas of the United States* (New York: Free Press, 1961, pp. 506-517). In making final determinations regarding regional composition, however, State Planning and Development Districts were also utilized (see Gilford C. Gilder, "Alabama Development Office: The Statewide Planning Agency," *Alabama Business*, Vol. 45, December 1974, pp. 18-19), along with the assistance of several knowledgeable consultants. In the final analysis, however, the regional lines used herein are somewhat arbitrarily derived and, as such, do not completely conform to any other delineations that are currently in use.
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12. Biggar, *op. cit.*, p. 4.
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15. *Ibid.*, p. 129.
16. Alabama Department of Public Health, *Alabama's Population: Her Changing Face, 1930-1972* (Montgomery, Alabama: Bureau of Vital Statistics), pp. 48 and 50.
17. Alabama Department of Public Health, *Alabama Vital Events for 1980, op. cit.*, p. 120.

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POPULATION REPORT

AGING IN ALABAMA: UNCERTAIN FUTURE FOR THE STATE'S ELDERLY

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Abstract — Like the nation as a whole, Alabama's elderly population is experiencing rapid growth. Accounting for only 3.0 percent of the state's population in 1900, the proportion 65 plus is expected to rise to nearly 13.0 percent by 1990. Growth is particularly pronounced among elderly whites, females, and the oldest of the old (i.e., those aged 85 plus). There are many more widows than widowers in the older age group, a consequence of male-female variations in life expectancy and the tendency for males to marry younger females. While an increasing number of Alabama's elderly live in urban areas, more also live alone. Considerably larger numbers reside in homes for the aged than formerly, while the number confined to mental hospitals has dropped appreciably. Despite recent gains, educational levels among the state's elderly remain far below those of the general population. Income levels follow a similar pattern, with nearly 30.0 percent of all elderly persons below the poverty level at the time of the last census. With continued increases in life expectancy and the eventual movement of the "baby boom" cohort into the ranks of the elderly, the number of aged will continue to grow. To meet the specialized needs associated with this rapidly growing population sector, informed planning — emphasizing both intermediate and long-term program development — is essential.

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Aging in Alabama: Uncertain Future for the State's Elderly

By William A. Barrett and Donald W. Bogie

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AGING IN ALABAMA: UNCERTAIN FUTURE FOR THE STATE'S ELDERLY

Highlights

- ★ The number of Alabama residents aged 60 plus has increased approximately seven-fold since the turn of the century, now amounting to over 16.0 percent of the total population. Those 65 plus comprise nearly 12.0 percent of the population.

- ★ The 65 plus age category grew more rapidly than any other population sector during the 1970s, except for persons in their 20s and 30s.

- ★ Those aged 65 plus increased over eight times faster during the last decade than those in their teens. There are now nearly as many elderly persons in the state's population as teenagers.

- ★ Within the elderly segment, the most rapidly increasing groups are those in their 70s and 80s. The "aging of the aged," therefore, is becoming an increasingly dominant trend among the elderly.

- ★ Resulting from differences in life expectancy, elderly females greatly outnumber elderly males. As a consequence, only about a third of all females 65 plus are married while greater than half are widowed.

- ★ Elderly whites, especially females, are increasing at a faster rate than elderly blacks. White females 65 plus now total close to one half of the elderly population.

- ★ A growing number of elderly persons (especially females) live alone, while about 4.0 percent of those aged 65 plus resided in homes for the aged at the time of the 1980 Census.

- ★ Educational levels are considerably lower among those 65 plus than for the population generally. Over 50.0 percent of the elderly females and almost 60.0 percent of the aged males have completed eight years of schooling or less.

- ★ Although the poverty rate has declined among the state's elderly during the last decade, nearly 30.0 percent of those 65 plus were still below the poverty level in 1980.

- ★ The number of elderly persons will rise significantly in the years ahead, calling for basic changes in existing institutional arrangements and greatly increasing the demand for specialized services.

INTRODUCTION

Of the various age groups within the U.S. population, the elderly comprise one of the most rapidly growing components. Accounting for only a small percentage of the total population just a few decades ago, better than one out of every ten Americans is now in excess of sixty-five years of age. As the number of elderly has grown, so has their visibility and the magnitude of their impact. Their distinctive lifestyles and preferences influence a growing segment of American life, their increasing political power has sparked considerable interest from politicians and governmental planners, and their display of economic strength in the marketplace has engendered more than a casual response from industry and business. More and more elderly Americans are cast in central roles in advertising and the visual arts, effectively challenging the long-term domination of these fields by the young. Institutions, including churches, hospitals, universities, and even prisons, have experienced the effects of their expanding numbers. Indicative of a growing national interest in the aging population, a recent White House Conference was devoted entirely to its needs and problems.

While today's elderly are more affluent and can look forward to living a greater number of years after retirement than their predecessors, their growing numbers have been the subject of much discussion and considerable concern. The health care delivery system, through which the elderly already receive a growing share of services, will be pressured even more as additional persons enter the older age groups and as a larger proportion of these individuals live to older ages. The same pattern holds for social services, as a multitude of new agencies, programs, and professionally trained personnel will be needed in order to serve the needs of an aging population. That the elderly are on the receiving end of most of the income transfers from governmental sources is not encouraging news for those of working age who must provide much of the support. Annual increases in the Social Security tax, for example, have become matter of fact, while speculation abounds concerning the long-term stability of the program itself as the ratio of elderly persons to workers continues to rise.

These are only a few of the implications associated with the growth of the elderly population in the United States, and in Alabama.[1] The impact will be felt by everyone, irrespective of age, as basic adjustments will be required in existing institutional arrangements and organizational structures. Judicious planning, therefore, must be undertaken at the earliest possible date if the specialized demands of an aging population are to be successfully confronted.

The following report reviews the growth of the elderly population in Alabama and provides a glimpse into the living arrangements and social characteristics of this segment of the state's citizenry. While the focus is on contemporary patterns and trends, it will begin by providing a historical review of population change.

Overview of the Elderly Population

Rapidly Increasing Numbers

The total population of the state has slightly more than doubled since the turn of the century. During that same period, however, the number of elderly persons has increased by approximately seven-fold. With only about 87,000 persons aged 60 plus residing in the state in 1900, the number had grown to slightly over 609,000 in 1980 (Table 1). Current estimates (mid-1985) place in excess of 663,000 Alabamians in that age group with projections indicating as many as 718,000 in that category by 1990. For those 65 plus, the corresponding numbers for 1985/1990 are 486,000 and 532,000.[2]

The elderly as a percentage of the state's total population has also increased dramatically. While those aged 60 plus amounted to only 4.8 percent of the population in 1900, the percentage had more than tripled by 1980 to 15.6. Over that same period, the percent 65 plus nearly quadrupled (from 3.0 to 11.3). (Table 1.) For mid-1985, estimates indicate that 16.2 percent of the population was in the 60 plus age group (11.8 percent for those 65 plus), while projections for 1990 are 16.4 (60 plus) and 12.2 (65 plus).[3] These trends closely mirror those

TABLE 1

ALABAMA POPULATION CHANGE, TOTAL POPULATION AND ELDERLY POPULATION, 1900 - 1980

Year	Total Population	Percent Change from Preceding Census	Number 60+	Percent Of Total Population 60+	Percent Change from Preceding Census	Number 65+	Percent Of Total Population 65+	Percent Change From Preceding Census
1900	1,828,697	--	86,938	4.8	--	54,306	3.0	--
1910	2,138,093	16.9	108,201	5.1	24.5	65,363	3.1	20.4
1920	2,348,174	9.8	133,993	5.7	23.8	83,498	3.6	27.7
1930	2,646,248	12.7	155,188	5.9	15.8	99,240	3.8	18.9
1940	2,832,961	7.1	211,002	7.4	36.0	136,209	4.8	37.3
1950	3,061,743	8.1	287,881	9.4	36.4	198,648	6.5	45.8
1960	3,266,740	6.7	369,765	11.3	28.4	261,147	8.0	31.5
1970	3,444,165	5.4	475,287	13.8	28.5	325,961	9.5	24.8
1980	3,893,888	13.1	609,114	15.6	28.2	440,015	11.3	35.0

Sources: U.S. Bureau of the Census, 1970 Census of Population, PC(1)-B2, Table 21; and U.S. Bureau of the Census, 1980 Census of Population, PC80-1-B2, Table 20.

occurring for the U.S. as a whole, where 11.3 percent (exactly the same percentage as Alabama) was aged 65 plus in 1980 with the proportion projected to increase to 12.7 by the end of the decade.[4]

During each decade of the twentieth century, the number of elderly (whether 60 plus or 65 plus) has increased rapidly — much faster than Alabama's population generally. For each decade between 1930 and 1970, for example, the 65 plus group grew approximately five times faster than that for all age categories combined. While the growth rate moderated during the 1970s, this age segment still grew over three times more rapidly than the total population (Table 1). More recently, the Census Bureau has estimated that Alabama's overall population increased by 2.5 percent between 1980 and 1984, but that the proportion 65 plus jumped by 8.2.[5]

Elderly Nearly Outnumber Teens

The state's elderly population (i.e., 65 plus) grew faster than any other age group during the 1970s, except for young adults in their 20s and 30s (who increased by 36.8 percent). Growth among the elderly far outpaced that for teenagers, which was registered at only 4.2 percent. As a consequence, there were only about 71,000 fewer aged persons in the state's population in 1980 than those between the ages of thirteen and nineteen.[6]

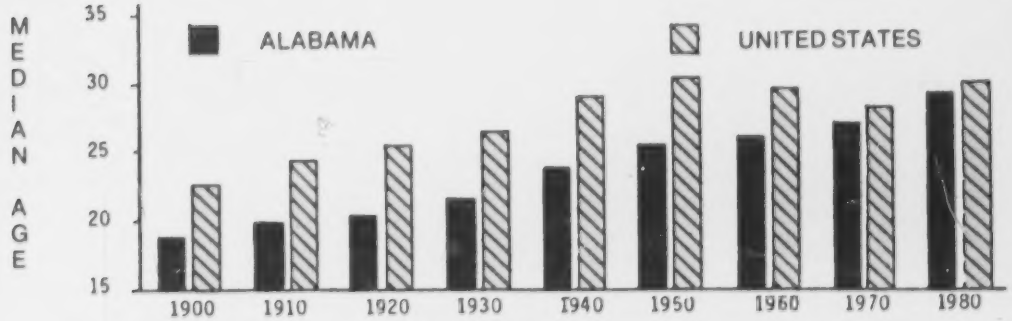
Median Age Near Thirty

Changes in the median age of the Alabama population provide another index of aging. In 1900, the median age (half above, half below a given age) was only 18.9. By 1980, the median age had climbed to 29.2. As shown in Figure 1, Alabama's median age has been marked by uninterrupted increases since the beginning of the century. While lagging perceptibly behind the U.S. until 1970 (largely a result of high fertility rates), the gap is now beginning to close. As a consequence, the median age during the remainder of the century is expected to parallel that of the country as a whole.

The rapid increase in the elderly population, along with the upward trend in the median age, can be traced in large measure to lower mortality rates. The really major gains in controlling mortality, however, have been made toward the beginning of life rather than at the end. With many more youngsters surviving the neonatal and early childhood period, life expectancies — along with the number of persons eventually entering the older age groups — have increased substantially. Migration patterns

FIGURE 1

MEDIAN AGE, ALABAMA AND THE U.S., 1900-1980



	1900	1910	1920	1930	1940	1950	1960	1970	1980
Alabama	18.9	19.7	20.3	21.5	23.8	25.5	26.0	27.0	29.2
United States	22.9	24.1	25.3	26.5	29.0	30.1	29.5	28.1	30.0

Sources: U.S. Bureau of the Census, 1980 Census of Population, PC80-1-B1, Table 42 and PC80-1-B2, Table 20; and U.S. Bureau of the Census, 1970 Census of Population, PC(1)-B2, Table 21.

are also a factor. Throughout much of this century, the state has experienced net migration losses involving younger persons for the most part. The differential tendency for those of various ages to migrate has left behind an aging population.

The Old Get Older

Not only are there more older persons in the state's population now than in the past, but as a result of increases in life expectancy, a new phenomenon is occurring: that of the aging of the aged. More persons than ever before are reaching the milestone of three score and ten and living well into their 80s or even 90s. All age categories within the Alabama population beginning with the 70-74 group increased notably during the 1970s, with the 85 plus age segment experiencing an increment of nearly 40.0 percent (Table 2). Considered to be "frail elderly," the special needs of this rapidly growing segment of the population will demand increased attention from service providers in the years ahead.

Females Outnumber Males

During the 1970s, elderly females increased at a faster pace within the total population than elderly males. Amounting to 7.9 percent of Alabama's population in 1970, females aged 60 plus had increased to 9.2 percent by 1980 (Table 2). The proportion of elderly males, however, rose from 5.9 percent to only 6.5. These variations trace, in part, to the continuing differences in life expectancies between the sexes. While mortality rates have declined among both sexes in recent years, the fall has been somewhat greater among aged females than males.

TABLE 2

ELDERLY POPULATION BY AGE AND SEX, ALABAMA, 1970 AND 1980

Age	1970 Number	1970 Percent of Total Population	1980 Number	1980 Percent of Total Population	Percent Change 1970-1980
			A. Males		
60-64	68,558	2.0	76,539	2.0	11.6
65-69	53,311	1.5	67,931	1.7	27.4
70-74	36,215	1.1	50,261	1.3	38.8
75-79	23,451	0.7	31,608	0.8	34.8
80-84	13,435	0.4	15,594	0.4	16.1
85/over	8,994	0.3	9,979	0.3	11.0
Total 60+	203,964	5.9	251,912	6.5	23.5
			B. Females		
60-64	80,768	2.3	92,560	2.4	14.6
65-69	68,843	2.0	88,364	2.3	28.4
70-74	49,535	1.4	71,826	1.8	45.0
75-79	35,292	1.0	51,018	1.3	44.6
80-84	21,461	0.6	29,394	0.8	37.0
85/over	15,424	0.4	24,040	0.6	55.9
Total 60+	271,323	7.9	357,202	9.2	31.7
			C. Total		
60-64	149,326	4.3	169,099	4.3	13.2
65-69	122,154	3.5	156,295	4.0	27.9
70-74	85,750	2.5	122,087	3.1	42.4
75-79	58,743	1.7	82,626	2.1	40.7
80-84	34,896	1.0	44,988	1.2	28.9
85/over	24,418	0.7	34,019	0.9	39.3
Total — All Persons 60+	475,287	13.8	609,114	15.6	28.2

Sources: U.S. Bureau of the Census, 1970 Census of Population, PC (1)-B2, Table 20; and U.S. Bureau of the Census, 1980 Census of Population, PC80-1-B2, Table 20.

As to be expected, therefore, the number of elderly females increased considerably faster during the last decade than the number of aged males (31.7 percent vis-a-vis 23.5). For males, the most rapidly growing age groups were those in their late 60s and throughout the 70s. Among females, however, it was the oldest age groups (i.e., those beyond 70) that displayed the greatest rate of increase and that largely account for the "aging of the old." Particularly noteworthy is the very rapid rate of growth experienced by those aged 85 plus (Table 2). Again, improvements in mortality experience largely account for the increases occurring for both males and females. Differentials between the sexes in the rate of improvement are easily discerned, however, with females in all age groups increasing at a faster rate than males.

A close examination of median age differences (see Figure 2) provides further indication of male-female disparities in life expectancy. While there was not much variation during the first half of the century, age differences between the sexes have become much more pronounced during the last three decades. The median age for Alabama females is now almost thirty-one, nearly three years higher than that for males.

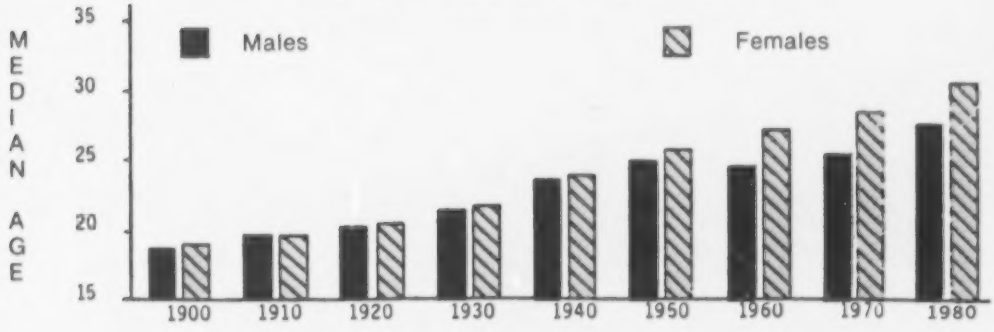
Lowest Ratio Ever

One consequence of the continuing variations in life expectancies is an unbalanced sex ratio (i.e., fewer males than females) in the older age groups. In 1980, there were only 66.3 males per 100 females for those 65 plus while in 1970 there were 71.1 (ratios calculated from data in Table 2). Alabama's sex ratio was nearly equal in 1920 (at 99.8), but prior to that time males predominated.[7] International migration patterns, in which males outnumbered females in earlier years, may partially explain the excess of males prior to the 1920s. Higher mortality rates among females during past decades (especially as a result of childbearing) are also a factor.

The data in Table 2 indicate, furthermore, that the sex ratio decreases with age and that it has gone down over time. In 1970, there were 84.9 males aged 60-64 per 100 females in the Alabama population. In the 85 plus age group, however, the ratio was 58.3. Corresponding data for 1980 reveal sex ratios of 82.7 and 41.5, respectively. Part of the decline in the ratio of males to females can be traced to the greater increase in life expectancy among females than males during the last decade. Another factor is the large increase during the 1970s in the number of females in the 70 plus age category. Females in this age group increased by 44.8 percent, while the number of males increased by only 30.9 percent. (All

FIGURE 2

MEDIAN AGE BY SEX, ALABAMA, 1900-1980



	1900	1910	1920	1930	1940	1950	1960	1970	1980
Males	18.7	19.7	20.2	21.4	23.6	25.0	24.7	25.4	27.8
Females	19.0	19.7	20.3	21.7	24.0	25.9	27.1	28.5	30.7

Sources: U.S. Bureau of the Census, 1980 Census of Population, PC80-1-B2, Table 20; and U.S. Bureau of the Census, 1970 Census of Population, PC (1)-B2, Table 21.

of the above calculations are based on data appearing in Table 2.)

Implications of Growth/ Differential Mortality

The increase in the elderly population, both in numerical terms and in proportional changes, portends a greater demand for a number of vital services in the years ahead. The need for suitable housing, appropriate recreational outlets, and a wide range of social and health services will increase substantially. In addition, the elderly will continue to display growing political clout and to exercise considerable influence in the business and market sectors. Their lifestyle and outlook will have implications for a growing segment of American society, much as the "baby boom" generation of the 1950s has had significant impact on national issues and trends over the last two decades. Due to their increasing numbers, the demands of the oldest of the old, overly represented by widowed females, will be particularly felt. Especially noteworthy will be their need for health care, specialized housing arrangements, and a wide variety of social services.

Racial Distribution/ Residence Patterns

Whites Outnumber Blacks

Approximately three-fourths (76.5 percent) of those aged 60 plus in 1980 were

TABLE 3

ELDERLY POPULATION BY AGE, SEX, AND RACE, ALABAMA, 1970 and 1980

Age	1970 Number	1970 Percent of Total Age Group	1980 Number	1980 Percent of Total Age Group	Percent Change 1970-1980
		A. White Males			
60-64	52,073	11.0	61,062	10.0	17.3
65-74	65,418	13.8	90,041	14.8	37.6
75+	33,447	7.0	42,032	6.9	25.7
Total 60+	150,938	31.8	193,135	31.7	28.0
		B. White Females			
60-64	60,682	12.8	71,852	11.8	18.4
65-74	86,488	18.2	121,325	19.9	40.3
75+	54,378	11.4	79,509	13.1	46.2
Total 60+	201,548	42.4	272,686	44.8	35.3
		C. Black Males			
60-64	16,408	3.5	15,284	2.5	- 6.9
65-74	23,969	5.0	27,879	4.6	16.3
75+	12,266	2.6	15,016	2.5	22.4
Total 60+	52,643	11.1	58,179	9.6	10.5
		D. Black Females			
60-64	19,984	4.2	20,470	3.4	2.4
65-74	31,733	6.7	38,426	6.3	21.1
75+	17,675	3.7	24,675	4.1	39.6
Total 60+	69,392	14.6	83,571	13.7	20.4
Total — All Persons 60+[a]	475,287	100.0	609,114	100.0	28.2

[a] Total includes 766 of other races in 1970 and 1,543 in 1980.

Sources: U.S. Bureau of the Census, 1970 Census of Population, PC(1)-B2, Table 20; and U.S. Bureau of the Census, 1980 Census of Population, PC80-1-B2. Table 20.

white; 23.3 percent were black; and the remainder represented persons of other races (percentages calculated from data appearing in Tables 1 and 3). White females comprised the largest group of Alabama's elderly (44.8 percent), followed by white males (31.7). (Table 3.) White females represent a larger proportion of the older population now than ten years ago, white males have remained about the same, while blacks (both males and females) have declined. This pattern undoubtedly traces to the heavy out-migration of blacks during earlier decades of this century, leaving few blacks in the older age groups today. Overall, aged blacks have declined as a percentage of the total elderly (from 25.7 percent in 1970 to 23.3 in 1980) while whites have increased (from 74.3 percent to 76.5). (Percentages are based on data contained in Table 3.)

An examination of various age cohorts among the state's elderly reveals that the number in all race-sex categories has increased over the last decade, except for black males in the 60-64 age range (Table 3). Most of the increases have been substantial, particularly those involving whites. The increase in the 60-64 age category is universally lower, however, than that for other age groups. This age cohort traces to the 1915-20 period; hence, the lower growth rate may reflect postponement of marriage and decreased fertility levels associated with the World War I era. Not to be ignored, however, is the widespread flu epidemic of 1918.

TABLE 4

DISTRIBUTION OF THE ELDERLY POPULATION
BY RACE AND PLACE OF RESIDENCE, ALABAMA, 1970 and 1980

Place of Residence	1970 Number	1970 Percent of Total Group	1980 Number	1980 Percent of Total Group	Percent Increase 1970-1980
		A. White 65+			
Urban	131,905	55.0	193,675	58.2	46.8
Central City	56,264	23.5	85,360	25.6	51.7
Rural	107,826	45.0	139,232	41.8	29.1
Total	239,731	100.0	332,907	100.0	38.9
		B. Black 65+			
Urban	51,755	60.4	70,758	66.8	36.7
Central City	25,234	29.5	40,064	37.8	58.8
Rural	33,888	39.6	35,238	33.2	4.0
Total	85,643	100.0	105,996	100.0	23.8
		C. Total Population 65+			
Urban	184,021	56.5	265,095	60.2	44.1
Central City	81,689	25.1	125,790	28.6	54.0
Rural	141,940	43.5	174,920	39.8	23.2
Total	325,961	100.0	440,015	100.0	35.0
		D. Total Population 75+			
Urban	66,948	56.7	100,163	62.0	49.6
Central City	29,141	24.7	47,549	29.4	63.2
Rural	51,109	43.3	61,470	38.0	20.3
Total	118,057	100.0	161,633	100.0	36.9

[a] The number white aged 65 plus added to the number black 65 plus does not total the number reported for the total population 65 plus due to the exclusion of persons of other races from the black/white categories.

Sources: U.S. Bureau of the Census, 1970 Census of Population, PC(1)-B-2, Table 20; and U.S. Bureau of the Census, 1980 Census of Population, PC80-1-B2, Table 19.

White Females Abound

The general pattern that emerges during the last decade is the growing number of elderly whites, females in particular. Until mortality schedules improve for other segments of the elderly population, this trend can be expected to continue. Population estimates for 1985, for example, indicate an increase in the white female segment of Alabama's population 65 plus to 46.1 percent of all elderly (up from 45.6 in 1980), while projections to 1990 foretell a further increase to 46.5.[8]

Increasingly Urban

Consistent with trends occurring within the population generally, older Alabamians became increasingly concentrated in urban areas during the 1970s.[9] The proportion of the elderly 65 plus living in towns and cities increased from 56.5 percent in 1970 to 60.2 percent in 1980 (Table 4), achieving approximately the same percentage urban as the total population. Only about one-fourth of those 65 plus resided in the central cities of the state's eight metropolitan areas, indicating that a significant number of the elderly live in smaller towns and cities scattered across the state. Still, however, a sizable number lived in such cities as Birmingham (39,399), Mobile (22,311), Montgomery (17,916), and Huntsville (10,039).[10]

Elderly blacks were somewhat more urbanized than whites in 1980, with 66.8 percent living in urban areas as opposed to 58.2 for whites (Table 4). Furthermore, a higher proportion of older blacks than whites resided in the central cities of the state's metropolitan centers.

All components of Alabama's elderly population are rapidly urbanizing (see Table 4). Regarding age, the frail elderly (considered to be those 75 plus) experienced the greatest increase in urban growth (at 49.6 percent) during the 1970s. For those 65 plus, the percentage was 44.1. Although the number of aged whites living in urban areas increased somewhat more than the number of older blacks, the percentage difference was only moderate (46.8 as compared with 36.7). The most rapid growth of all, however, has occurred in the central cities of metropolitan areas. For all groups (65 plus, 75 plus, whites and blacks), the percentage increase during the 1970s was in excess of 50.0, with the greatest increase registered among those 75 plus.

Urban Costs vs. Benefits

The concentration of the elderly in urban areas offers both advantages and disadvantages. On the positive side, most of the specialized services required by the elderly are readily available and conveniently located. When larger groups of clients are concentrated in a single area (as in the state's large metropolitan centers), many types of services can be provided more efficiently and economically. Clients generally have better access to — and more knowledge of — available services and, because of their growing political influence, elected officials may be more responsive to their distinctive needs.

Urban residence does not come without cost, however. Much of the social interaction between persons in cities is based on, and results from, participation in the labor force. Once the individual retires, many of these contacts are no longer maintained; hence, elderly persons have a tendency to become somewhat alienated and socially isolated. Many elderly persons own their own homes, and have lived in the same houses throughout much of the family life cycle. Frequently, however, their homes are located in older neighborhoods that are experiencing varying degrees of deterioration. Not wanting to move, yet fearing the prospects of neighborhood change, new people with different lifestyles, and fundamental changes in community institutions, a considerable degree of dissonance and personal discord may be the result. Public transportation services, moreover, are on the decline in many cities. With the curtailment of public transportation, the elderly are frequently forced to depend on considerably more expensive forms of conveyance.

Transportation is a particularly vexing problem for Alabama's elderly, regardless of place of residence. Almost a third of the housing units occupied by a household head or spouse 65 plus in 1980 were without the presence of a motor vehicle. Furthermore, one-fifth of the elderly were classified as having a transportation disability, with many of these requiring specialized transportation modes such as vans or buses with wheelchair lifts (Table 5).

TABLE 5

TRANSPORTATION RELATED PROBLEMS AMONG THE ELDERLY
BY PLACE OF RESIDENCE, ALABAMA, 1980

Transportation Problem	Place of Residence: Rural Number	Rural Percent of Total 65+	Urban Number	Urban Percent of Total 65+	Total Number	Total Percent of Total 65+
Housing Units With No Vehicle Available[a]	33,317	27.3	55,540	31.0	88,857	29.5
Persons 65+ With Transportation Disability	36,048	20.9	49,177	19.7	85,225	20.2

[a] Occupied by householder or spouse 65 plus.

Sources: U.S. Bureau of the Census, 1980 Census of Population, PC80-1-C2, Table 70; and U.S. Bureau of the Census, 1980 Census of Housing, PC80-1-B2, Table 61.

Marital Status

Many Widows, Few Widowers

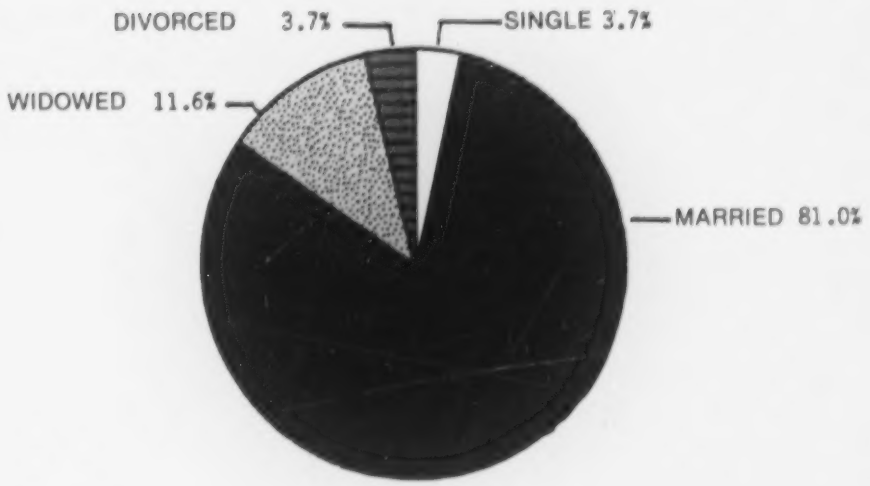
Elderly males are far more likely to be married than elderly females, while older females are much more apt to be widowed than older males (Figure 3). While four-fifths (81.0 percent) of Alabama's males aged 60 plus were married at the time of the 1980 census, the corresponding percentage for females was only 43.0. On the other hand, while only 11.6 percent of the males aged 60 plus were widowed, about half (48.5 percent) of the females were widowed (Table 6). For males aged 65 plus in 1980, the percentage who were married dropped to 78.8, but for females it declined to just 35.8.[11] Again, it is the differential in life expectancies between the sexes that largely account for the variations. In 1984, for example, the life expectancy of a female born in Alabama outpaced that of a newly born male by approximately eight years.[12] A contributing factor, however, is the tendency for females to marry someone older than themselves.

Table 6 also provides comparisons concerning the marital status of Alabama's elderly over the last ten years by age-sex groups. Briefly, these data indicate that the percentage remaining unmarried has declined; that the proportion of married males has increased slightly; that the percentage of widowed males has dropped slightly; and that the percentage divorced has increased for both sexes. Further,

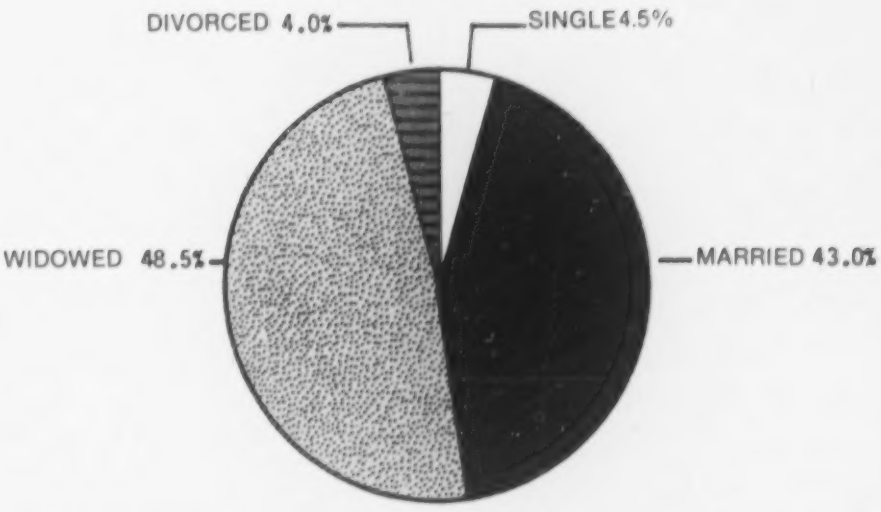
FIGURE 3

MARITAL STATUS OF PERSONS AGED SIXTY AND OVER,
ALABAMA, 1980

MALES



FEMALES



Sources: U.S. Bureau of the Census, 1980 Census of Population, PC80-1-D2, Table 205.

the data reveal that the proportion married, as well as divorced, has decreased with age, while the percentage widowed has increased dramatically.

Further analysis indicates that whites (both males and females) were more likely to be married than blacks in 1980. Approximately four-fifths (82.2 percent) of the white males 65 plus were married, compared to only 68.1 percent of the black

TABLE 6

MARITAL STATUS OF THE ELDERLY POPULATION BY AGE GROUP AND SEX, ALABAMA, 1970 and 1980

Marital Status	Age Group: 60-64 Percent/Number	65-74 Percent/Number	75 + Percent/Number	Total Age Group Percent/Number
A. Males - 1970				
Single	4.7 (3,247)	4.8 (4,311)	5.4 (2,483)	4.9 (10,041)
Married	86.3 (59,675)	82.0 (73,772)	64.5 (29,451)	79.6 (162,898)
Widowed	5.6 (3,903)	10.6 (9,490)	28.3 (12,904)	12.8 (26,297)
Divorced	3.3 (2,286)	2.6 (2,348)	1.8 (807)	2.7 (5,441)
Total	100.0 (69,111)	100.0 (89,921)	100.0 (45,645)	100.0 (204,677)
B. Females - 1970				
Single	5.1 (4,241)	6.1 (7,288)	7.6 (5,346)	6.2 (16,875)
Married	61.3 (50,486)	44.6 (53,725)	19.1 (13,452)	43.1 (117,663)
Widowed	29.6 (24,414)	46.7 (56,210)	71.8 (50,583)	48.0 (131,207)
Divorced	3.9 (3,248)	2.6 (3,131)	1.5 (1,085)	2.7 (7,464)
Total	100.0 (82,389)	100.0 (120,354)	100.0 (70,466)	100.0 (273,209)
C. Males - 1980				
Single	3.9 (3,056)	3.6 (4,207)	3.4 (1,970)	3.7 (9,233)
Married	86.2 (66,678)	83.3 (97,599)	69.4 (39,908)	81.0 (204,185)
Widowed	5.2 (4,026)	9.4 (10,991)	24.6 (14,143)	11.6 (29,160)
Divorced	4.7 (3,612)	3.7 (4,301)	2.5 (1,456)	3.7 (9,369)
Total	100.0 (77,372)	100.0 (117,098)	100.0 (57,477)	100.0 (251,947)
D. Females - 1980				
Single	3.5 (3,275)	4.7 (7,486)	5.1 (5,369)	4.5 (16,130)
Married	63.5 (58,942)	46.6 (74,693)	19.4 (20,286)	43.0 (153,921)
Widowed	27.4 (25,452)	44.5 (71,313)	73.3 (76,745)	48.5 (173,510)
Divorced	5.6 (5,222)	4.3 (6,868)	2.2 (2,253)	4.0 (14,343)
Total	100.0 (92,891)	100.0 (160,360)	100.0 (104,653)	100.0 (357,904)

Sources: U.S. Bureau of the Census, 1970 Census of Population, PC(1)-D2, Table 152; and U.S. Bureau of the Census, 1980 Census of Population, PC80-1-D2, Table 205.

males. On the other hand, 37.8 percent of the white females were married compared to only 29.8 percent of the black females. The same pattern also emerges when data for 1970 are examined.[13] Life expectancies vary considerably between the races, largely explaining the variations. In 1983, the life expectancy for a white female born in Alabama was 80.5 while that of a white male was 71.2. For nonwhite females, however, it was 75.9; for nonwhite males, only 65.5.[14] In addition, differences in marriage rates (i.e., blacks are less likely to marry than whites) also contribute to this pattern.[15]

Changes in the Family Affect Widowhood

To be elderly and widowed brings on problems in any setting, but particularly in contemporary urban society. In the United States it means the loss of companionship, a reduced income resulting in a lower level-of-living, and greater dependence on others, especially formal agencies, for basic services and assistance in meeting essential needs. Earlier, reliance could be placed on members of the extended family for various types of support but, with the decline of the kinship group and increased geographic mobility, this is no longer a possibility for a growing segment of the population.

Household Composition and Housing

More Live Alone

Both qualitative and quantitative relationships within the household have important implications for the elderly and the larger community. To be a member of a family or live in a household with others usually means companionship, emotional support and, often times, financial assistance from other family or household members. For those living alone, however, these stabilizing mechanisms may be absent. Those who provide services to the elderly, therefore, are frequently called upon to increase the

TABLE 7

HOUSEHOLD PATTERNS AMONG THE ELDERY POPULATION, ALABAMA 1970 AND 1980

Household Pattern	1970 Number 65+	1970 Percent of Total Population 65+	1980 Number 65+	1980 Percent of Total Population 65+	Percent Change 1970-1980
Male Family Householders[a]	102,062	32.9	129,080	30.6	25.5
Female Family Householders[a]	24,645	7.9	35,740	8.5	45.0
Spouses[b]	59,004	18.9	88,639	21.0	50.2
Other Relatives[c]	45,644	14.6	41,116	9.7	-9.9
Nonrelatives[d]	4,506	1.4	3,943	0.9	-12.5
Male Nonfamily Householders[e]	15,775	5.0	24,426	5.8	54.8
Female Nonfamily Householders[e]	60,057	19.2	99,151	23.5	65.1
Total	312,493[f]	100.0	422,095[f]	100.0	35.1

a The term "householder" was used in the 1980 Census to designate the household member (or one of the members) in whose name the home was owned or rented. The term "head of household," on the other hand, was used in 1970. A householder lives with one or more persons related to him/her by birth, marriage, or adoption.

b "Wife of head" in 1970; persons married to and living with a householder in 1980.

c Any person (other than the spouse) living in the household and related to the "head of household" (1970) or to the "householder" (1980). This category includes aging parents residing with their offspring, etc.

d Any person not related to the "head of household" (1970) or to the "householder" (1980). This arrangement involves elderly persons living with friends, elderly persons living with nonrelatives by virtue of employment, etc.

e This category encompasses elderly persons living alone.

f Excludes persons living in group quarters (i.e., homes for the aged, mental hospitals, roomers, boarders, etc.)

Sources: U.S. Bureau of the Census, 1970 Census of Population, PC(1)-B2, Table 22, and U.S. Bureau of the Census, 1980 Census of Population, PC80-1-B2, Table 24.

involvement of the aged in informal community networks and/or to develop specialized programs to fit their particular needs. Both strategies are designed to assist the elderly in coping with living arrangements conducive to the development of loneliness and alienation.

Approximately 71.0 percent of the state's elderly population resided with someone else in 1980, down slightly from the 75.7 percent who shared living arrangements in 1970 (Table 7, adding percents reported for the first five categories). The vast majority of these persons were heads of households (or "householders," according to the terminology now used by the Census Bureau) who lived with their spouses. A significant — and growing — proportion of the elderly live alone, however, as indicated by the increase in both male and female nonfamily households during the last decade.

Given the rising number of elderly persons generally, the number of male household heads, female heads, and spouses of heads all increased greatly during the 1970s. Those living with relatives and those residing with nonrelatives both declined, however, while the number of males and females (especially females) living alone rose substantially (Table 7). This pattern may indicate a number of possibilities, including an increasing preference for living alone; the positive impact of programs designed to assist the elderly in maintaining an independent existence; improvements in health and economic status; and, on a more pessimistic note, a growing unwillingness of relatives and friends to care for the elderly.

Rising Number in Homes for the Aged

Persons not able to maintain a household or find other informal living arrangements often spend their remaining years in an institution of one type or another in some other form of collective setting. Referred to by the Census Bureau as "group quarters,"

TABLE 8

ELDERLY PERSONS LIVING IN GROUP QUARTERS BY TYPE OF QUARTERS AND SEX, ALABAMA, 1970 and 1980

Type of Group Quarters	1970 Number 65 +	1970 Percent of Total Category 65 + [a]	1980 Number 65 +	1980 Percent of Total Category 65 + [a]	Percent Change 1970-1980
		A. Males			
Homes for Aged	2,512	1.8	4,159	2.4	65.6
Mental Hospitals	968	0.7	145	0.1	-85.0
Roomers/Boarders	201	0.1	82	—[b]	-59.2
Other[c]	781	0.6	627	0.4	-19.7
Total, Males 65 + in Group Quarters	4,462	3.3	5,013	2.9	12.3
		B. Females			
Homes for Aged	7,049	3.7	12,380	4.7	75.6
Mental Hospitals	1,109	0.6	216	0.1	-80.5
Roomers/Boarders	141	0.1	184	0.1	30.5
Other[c]	774	0.4	483	0.2	-37.6
Total, Females 65 + in Group Quarters	9,073	4.8	13,263	5.0	46.2

[a] Percentages are based on sample counts of the total population aged 65 and over. See U.S. Bureau of the Census, 1970 Census of Population, PC(1)-C2, Table 48, and U.S. Bureau of the Census, 1980 Census of Population, PC80-1-D2, Table 207.

[b] Less than 0.1 percent.

[c] Includes persons housed in military quarters, correctional institutions, college dormitories, etc.

Sources: U.S. Bureau of the Census, 1970 Census of Population, PC(1)-D2, Table 154; and U.S. Bureau of the Census, 1980 Census of Population, PC80-1-D2, Table 207.

4.2 percent of the elderly population 65 plus was characterized by such living arrangements in 1980, while the percentage was 4.1 in 1970.[16] Elderly persons residing in group quarters in Alabama are more likely by far to be residents in homes for the aged (nursing homes in particular) than anything else. In 1980, 3.8 percent of all persons 65 plus lived in such settings, with the percentage increasing to 18.2 for those aged 85 plus.[17]

A much larger proportion of females aged 65 plus than males resided in group quarters in 1980 (i.e., 5.0 compared to 2.9). While both most frequently resided in homes for the aged the number of females in such settings was greatly in excess of the number of males (Table 8). It has previously been noted that females, on the average, live longer than males. They are more likely, therefore, to survive to the point where this type of living arrangement is most apt to be required.

The proportion of elderly males living in group quarters declined during the 1970s (from 3.3 to 2.9) while females increased (from 4.8 to 5.0). The rapid increase in females in the older age groups (75 plus) undoubtedly explains much of the increment (see Table 2). A particularly dramatic shift during the decade was the precipitous decline in the proportion of elderly persons (both males and females) who were patients in mental hospitals.

The actual number of aged persons living in group quarters increased by approximately one-third during the last decade (from 13,535 at the time of the 1970 Census to 18,276 on Census Day in 1980). (Determined from data presented in Table 8.) The increase was particularly noteworthy among females, but more males were also drawn to group settings. The number living in collectivities other than homes for the aged generally declined.

Some Housing Substandard

Most housing units (approximately three-fourths in 1980) occupied by those aged 65 plus are also owned by them, with the proportion slightly higher in rural areas (80.8 percent) than urban (71.1). This compares to approximately 65.0 percent of the units occupied by the population generally.[18] Although home ownership is the prevailing pattern among Alabama's elderly, much of the housing — especially in rural areas — is substandard. Homes tend to have been constructed in earlier years, with those in cities frequently located in older neighborhoods.

While limited information is available, the 1980 Census provides at least some insight into the living conditions of the state's elderly. These data indicate that over half of the housing units occupied by the elderly lack central heat, nearly 40.0 percent do not have air conditioning, with lower percentages (i.e., 10.0 percent or less) not having a telephone, and lacking complete plumbing and kitchen facilities (Table 9). For all of the preceding indicators of housing quality, rural housing occupied by the elderly fares substantially worse than that located in urban areas. Particularly significant is that central heating is absent in nearly 70.0 percent of the rural housing units.

Where central heat is lacking, space heaters are sometimes utilized as an alternative source of warmth. If cautionary measures are not carefully followed, however, their use can constitute a major threat to life. The lack of air conditioning is a particularly acute problem during the summer months. Some elderly persons refuse to raise their windows for fear of intruders, or to turn on air conditioning units because of economic considerations, increasing the likelihood of heat stroke and other weather related maladies. The availability of a telephone is crucial for most elderly persons, whether in maintaining social contact or for obtaining assistance during emergencies. About 10.0 percent of the homes occupied by the elderly in 1980 lacked this potentially life-saving resource, however, amounting to nearly 31,000 aged Alabamians.

Social service agencies and other community organizations have become increasingly aware of the need to provide comfort and safety to the elderly. Window locks, blankets, and fans have been distributed. Emergency shelters have been opened during periods of extreme weather. Since most of the elderly own their own homes, an extension of existing weatherization programs would appear to have much potential benefit. Low cost home improvement loans would also serve to enhance their quality of life.

Educational Attainment

Rising Educational Levels

The level of educational attainment has increased substantially for all segments of Alabama's population during the last decade. While the median years of school completed for those 25 plus was 10.8 in 1970, it had increased to 12.2 in 1980. Only 41.3 percent had completed twelve or more years of schooling in 1970, but 56.5 percent had reached that level ten years later.[19]

Similar educational gains have occurred among the elderly. The percentage aged 65 plus limited to eight years of schooling or less declined from 65.9 in 1970 to 54.1 in 1980, while the proportion completing twelve years or more increased from 18.9 to 26.7 (see totals, Table 10). Still, however, the above data indicate that educational attainment is considerably lower among the elderly than for the adult population generally. Less than half as many aged Alabamians as the general population, for example, have completed four years of high school or more.

Educational levels, as would be anticipated, vary according to age category within the elderly sector. For both males and females, the proportion completing just eight years or less rises steadily with advancing years. Conversely, the percentage having completed twelve years or more declines (Table 10).

TABLE 9

SELECTED CHARACTERISTICS OF HOUSING UNITS OCCUPIED BY A HOUSEHOLDER OR SPOUSE 65 YEARS OR OVER, BY LOCATION OF HOUSING UNIT, ALABAMA, 1980

Selected Characteristics	Location of Housing Unit					
	Rural		Urban		Total	
	Number	Percent[a]	Number	Percent[a]	Number	Percent[a]
Lacking Central Heating	84,886	69.5	70,620	39.5	155,506	51.7
Lacking Air Conditioning	64,011	52.4	55,161	30.8	119,172	39.6
No Telephone	18,762	15.4	11,904	6.7	30,666	10.2
Lacking Complete Plumbing	16,073	13.2	4,238	2.4	20,311	6.7
Lacking Complete Kitchen Facilities	12,463	10.2	4,316	2.4	16,779	5.6

[a]Of total number of housing units occupied by householder or spouse 65 plus.

Source: U.S. Bureau of the Census, 1980 Census of Housing, BC80-1-B2, Table 61.

Most Still Dropouts

Even with increasingly higher educational levels, a large segment of the state's elderly suffers from an inadequate amount of schooling. Three-fifths of the females 75 plus and nearly three-fourths of the males have completed just eight grades or less (Table 10). Over 15,000 elderly Alabamians had not attended school at all according to the 1980 Census, amounting to 3.5 percent of the elderly population. Another 62,000 (14.1 percent) had attended from only one to four years.[20] Many of Alabama's aged, therefore, undoubtedly experience difficulty in confronting such routine requirements as reading food labels, understanding medical instructions, interpreting households bills, comprehending legal documents, filing medical insurance claims, and preparing income tax returns. Specialized education programs aimed at assisting the elderly in addressing such needs have the potential for yielding significant benefit.

From the data presented herein, it is evident that a high percentage of the elderly are characterized by low levels of educa-

TABLE 10

EDUCATIONAL ATTAINMENT OF THE ELDERLY POPULATION BY SEX, ALABAMA, 1970 AND 1980

	1970		1980	
Age Group	Percent Completing 8 Yrs. or Less	Percent Completing 12 Yrs. or More	Percent Completing 8 Yrs. or Less	Percent Completing 12 Yrs. or More
		A. Males		
65 - 69	66.9	17.8	50.7	29.7
70 - 74	70.2	16.1	57.1	24.8
75 +	74.8	14.2	67.9	18.9
Total 65 +	70.5	16.1	58.2	24.7
		B. Females		
65 - 69	59.5	21.4	44.6	31.8
70 - 74	62.7	20.6	49.9	28.4
75 +	65.8	20.6	58.1	24.8
Total 65 +	62.7	20.9	51.4	28.1
		C. Total		
65-69	62.7	19.9	47.3	30.9
70-74	65.9	18.7	52.9	26.9
75+	69.4	18.1	61.6	22.7
Total — All persons 65 +	65.9	18.9	54.1	26.7

Sources: U.S. Bureau of the Census, 1970 Census of Population, PC (1)-D2, Table 148; and U.S. Bureau of the Census, 1980 Census of Population, PC80-1-D2, Table 203.

tion. Educational attainment, in turn, is highly correlated with lifetime earnings — meaning that many of the state's elderly do not have adequate financial resources for meeting the basic needs of life. Since much of the need involves medical care, specialized housing, transportation, and assistance with housekeeping, programs for the elderly are among the most expensive that individual communities and various levels of government are called upon to bear.

Income Levels and Poverty Status

Income Rises, But Real Gains Limited

Income levels increased dramatically among all segments of Alabama's elderly population during the 1970s, with the median approximately tripling for families and increasing by a ratio of 2.5 for "unrelated individuals" (basically persons living alone). (Table 11.) Elderly persons who retired during the 1970s were more apt to have supplemental pension plans than their predecessors and to receive more income from them. In addition, Social Security legislation mandating cost-of-living increases tied to the inflation rate has had a positive impact on income levels.

Still, however, the median income of families with a household head 65 plus was only about 54.0 percent of that for those aged 55-64, and just 42.0 percent of that for persons in the 45-54 age group (wherein median earnings are highest).[21] In addition, the

TABLE 11

MEDIAN INCOME OF THE ELDERLY POPULATION BY HOUSEHOLD COMPOSITION AND PLACE OF RESIDENCE, ALABAMA, 1969 AND 1979

Household Composition	1969			1979		
	Rural[a]	Urban	Total	Rural	Urban	Total
Family Householders, 65+ [b]	$2,706	$3,981	$3,189	$7,443	$10,303	$9,008
Unrelated Males, 65+ [c]	1,325	1,675	1,498	3,203	4,069	3,688
Unrelated Females, 65+ [c]	1,175	1,478	1,364	2,976	3,726	3,467

[a]Data for the combined rural population (i.e., rural nonfarm and rural farm) were not reported for 1969. The data appearing under the "rural" category for that year, therefore, represent an average of the median incomes reported for the rural nonfarm and the rural farm components of the population.

[b]A householder living with one or more persons related to him/her by birth, marriage, or adoption.

[c]A householder living alone or with nonrelatives only, a household member who is not related to the householder, or a person living in group quarters who is not an inmate of an institution.

Sources: U.S. Bureau of the Census, 1970 Census of Population, PC(1)-D2, Table 198; and U.S. Bureau of the Census, 1980 Census of Population, PC80-1-C2, Table 71.

Consumer Price Index more than doubled over the ten year period (rising from 116.0 to 247.0), largely negating the overall increase in income.[22] This means that although income levels have increased substantially, actual buying power in 1980 was not much greater than it was in 1970. On a more positive note, the disparity between rural and urban incomes has lessened slightly for family householders over the last decade (Table 11), as has that for families headed by the elderly as compared with the general population.[23]

Family householders have considerably more income at their disposal than unrelated individuals (Table 11). In family households, a younger spouse (usually the wife) may still be working, both spouses may be receiving Social Security benefits, and one or both may draw from retirement plans. Even if a spouse has no employment history, those 65 plus are eligible to receive Social Security payments amounting to one-half of that of the previously employed spouse. Unrelated individuals, however, do not have combined resources at their disposal, significantly limiting their ability to cope with the economic exigencies of daily living.

Smaller Proportions Below the Poverty Level

Poverty among the elderly may be related to a myriad of uncontrollable events, such as extended illness or loss of family income associated with the death of a spouse. While it is difficult to adequately determine the point at which individuals actually

TABLE 12

NUMBER AND PERCENT OF PERSONS AND UNRELATED INDIVIDUALS SIXTY-FIVE AND OVER BELOW THE POVERTY LEVEL, BY RACE, ALABAMA, 1969 AND 1979

Persons, Unrelated Individuals	1969		1979	
	Number	Percent	Number	Percent
		A. White		
Persons	89,600	39.1	72,592	22.9
Unrelated Individuals	38,558	65.8	40,965	43.7
		B. Black		
Persons	52,416	61.9	46,740	45.4
Unrelated Individuals	20,359	85.6	23,368	70.3
		C. Total		
Persons	142,164	45.2	119,729	28.4
Unrelated Individuals	58,995	71.6	64,570	50.6

Source: U.S. Bureau of the Census, 1980 Census of Population, PC80-1-C2, Table 61.

reach poverty status, the measure most frequently used originated with the Social Security Administration in 1964 (since revised) and is based on the USDA's "Economy Food Plan."[24] Adjusted for the number of persons in the family, separate poverty thresholds are developed according to the age of the householder (or "household head"). Poverty thresholds in 1970 for persons aged 65 plus were $2,194 for a family head in a two-person household and $1,749 for an unrelated individual.[25] By 1980, poverty levels for these categories had increased to $4,389 and $3,479.[26]

About 33,500 Alabama families with a household head 65 plus, 20.0 percent of the total headed by elderly persons, were classified as below the poverty level in 1980. This compares to 14.8 percent for the general population, but represents a 50.0 percent decline in the poverty rate that existed among families with an elderly head in 1970.[27] Table 12 provides data concerning poverty levels for two additional categories: (1) persons; and (2) unrelated individuals. While the poverty rate for persons 65 plus was similar to that for families in 1980 (see totals), the rate for unrelated individuals (mostly people living alone) was considerably higher. Although the percentage below the poverty level declined for both categories during the 1970s, the actual number of unrelated individuals classified as poor increased by 9.4 percent.

The state's poverty rate has fallen among both whites and blacks during the last decade (Table 12). Still, however, elderly blacks are much more likely to be poor than whites, owing partially to a faster decline in the occurrence of poverty among whites than blacks. At a particular disadvantage, are aged blacks who live alone or with unrelated individuals, 70.0 percent of whom were still classified as poor in 1980.

While reported poverty levels in the United States have recently declined for the total population, as well as elderly persons, 12.4 percent of all persons aged 65 plus were classified below the poverty level in 1984. This compares to 14.4 percent for the total population.[28]

Source of Income

Although it is correctly assumed that most elderly persons are receiving Social Security payments (about 88.0 percent of Alabama family heads 65 plus in 1979) and that more and more are receiving benefits

TABLE 13

PERCENT OF TOTAL INCOME FROM SPECIFIED SOURCE FOR ALABAMA FAMILIES WITH HEADS SIXTY-FIVE AND OVER, BY POVERTY STATUS AND TYPE OF FAMILY, 1979

	Below Poverty Level		Above Poverty Level	
Source of Income	Female Headed Families	All Families	Female Headed Families	All Families
Earnings	18.4	12.1	50.2	39.8
Social Security	49.4	64.3	24.9	29.7
Public Assistance	25.7	18.3	6.1	2.8
Other[a]	6.5	5.3	18.7	27.7
Total	100.0	100.0	100.0	100.0

[a] Includes interest, dividends, income from the rental of property, royalities, veterans payments, etc.

Source: U.S. Bureau of the Census, 1980 Census of Population, PC80-1-D2, Table 248.

from retirement plans, little is generally known about other sources of income. In addition to those previously mentioned, some elderly persons continue to work and receive income from earnings (48.4 percent of the family heads in 1979), some (22.3 percent) receive public assistance payments (Supplemental Security Income, or SSI, in particular), while some obtain income as a result of interest payments, dividends, and rental property (35.0 percent).[29]

For Alabama families with a head 65 plus and below the poverty level, the heaviest monetary dependence is on Social Security (Table 13). Almost two-thirds of the total income for this group was received from that source in 1979. Public assistance payments and earnings provide a significant amount of supplementary income, while little support is obtained from other sources. Those above the poverty level, however, received substantial amounts of income from a greater number of sources, with very limited reliance on Public Assistance. Female headed families in both groups showed more dependence on earnings and less dependence on Social Security than for all families combined.

Government transfer payments and benefit programs are extremely critical to the elderly and their importance should not be underestimated. Without these sources of income, a large number of older persons would either sink below the poverty level or become more deeply embedded therein — not a pleasant prospect for those who have reached the so-called "golden years."

The trend is for wider participation in government administered programs, probably as a result of an increased number of persons who are able to meet eligibility requirements. For Alabamians below the poverty level, for example, the percentage receiving social security and public assistance payments has increased over the last decade. Over that same period, however, the proportion receiving income from earnings has declined (Table 14).

Migration Patterns

Oldest of the Old Most Migratory

The relationship between age and the likelihood of moving from one locale to another is well documented.[30] Persons are most migratory when they are young (in their 20s and 30s). Hence, they generally exhibit less geographic mobility as they grow older. A closer examination of migration patterns reveals, however, that rates for the very young are also relatively high (as a result of parental mobility) and that those

TABLE 14

PERCENT RECEIVING SPECIFIED TYPES OF INCOME FOR ALABAMA FAMILIES BELOW THE POVERTY LEVEL WITH HEADS SIXTY-FIVE AND OVER, 1969 and 1979

Type of Income	1969		1979	
	Female Headed Families	All Families	Female Headed Families	All Families
Earnings	34.6	29.5	32.1	23.4
Social Security	64.0	77.5	75.5	82.8
Public Assistance	51.9	36.1	54.1	40.9
Other[a]	19.3	17.0	21.3	19.8

[a] See footnote, Table 13.

Source: U.S. Bureau of the Census, 1970 Census of Population, PC(1)-D2, Table 212; and U.S. Bureau of the Census, 1980 Census of Population, PC80-1-D2, Table 248.

among the oldest of the elderly are generally a bit higher than those for the less elderly.[31] The loss of the spouse is the precipitating force behind many of these moves, while forced mobility due to illness or the need for nursing home care are also contributing factors.

Although most (i.e., 82.0 percent) of the state's elderly did not move between 1975 and 1980, a greater proportion of those 75 plus than in the other age groups either moved from one place to another in the same county (13.3 percent) or from one Alabama county to another (3.5 percent). This pattern held true for both males and females, with a slightly higher proportion of females 75 plus than males experiencing both intracounty and intrastate movement

TABLE 15

MIGRATION PATTERNS OF THE ELDERLY POPULATION BY SEX, ALABAMA, 1975 - 1980

Age Category	Percent Same House	Percent Different House, Same County	Percent Different County, Same State	Percent Out of State or Abroad
		A. Males		
65-69	82.1	10.7	3.0	4.1
70-74	84.7	10.6	2.1	2.6
75 +	82.1	12.0	3.4	2.6
Total 65 +	82.8	11.1	2.9	3.2
		B. Females		
65-69	82.5	11.8	2.6	3.1
70-74	82.6	11.6	2.6	3.2
75 +	79.5	14.1	3.5	2.9
Total 65 +	81.3	12.6	3.0	3.1
		C. Total		
65-69	82.3	11.3	2.8	3.6
70-74	83.5	11.2	2.4	3.0
75 +	80.4	13.3	3.5	2.8
Total All Persons 65 +	82.0	12.0	2.9	3.1

Source: U.S. Bureau of the Census, 1980 Census of Population, PC80-1-D2, Table 200.

(Table 15). Due to differences in life expectancies, males are less likely to live to the point of needing specialized health care or nursing home residence. They may also be more likely to continue to live in their own home after the death of the spouse than females.

Even though the migration rate increases slightly for those in the oldest age group, those aged 65 plus are far more stationary than the population generally. While four-fifths of Alabama's elderly lived in the same house in 1980 as in 1975, the corresponding percentage for the total population was only 57.6. On the other hand, only about 3.0 percent of those 65 plus moved from one county to another within the state, while the percentage was 7.4 for all age groups combined (Table 15).[32] For those who provide services to the aged, as well as businesses and community institutions that cater to the elderly, low mobility rates make for a relatively predictable and stable clientele.

Life Expectancy

Dramatic Increase in Longevity

Life expectancies in the United States have increased greatly since the turn of the century. In 1900, a male at birth could ex-

TABLE 16

AVERAGE NUMBER OF YEARS OF LIFE REMAINING IN THE UNITED STATES AT SPECIFIED AGES, BY SEX, 1970, 1980, AND 1990

Age	Average Number of Years of Life Remaining		
	1970	1980	1990
	A. Males		
60	16.1	17.3	18.5
65	13.1	14.0	15.1
70	10.5	11.2	12.1
75	8.2	8.8	9.5
80	6.3	6.8	7.4
85	4.7	5.1	5.7
	B. Females		
60	20.9	22.2	23.7
65	17.1	18.4	19.8
70	13.6	14.8	16.2
75	10.5	11.5	12.8
80	7.8	8.7	9.8
85	5.7	6.3	7.2

Source: U.S. Department of Health and Human Services, Life Tables for the United States: 1900-2050, Actuarial Study No. 89, SSA Pub. No. 11-11536, December 1983.

pect to live only forty-six years, while a female could expect to live forty-eight.[33] Due to substantial reductions in the infant mortality rate and medical advances in the control of childhood and adult diseases, along with various social improvements, the life expectancy for males born in 1983 had increased to 71.0 while that for females had climbed to 78.3.[34] On the average, therefore, the length of life has been extended by 25 years (in the case of males) and 30 years (for females) over a period of less than 100 years. While comparable data are not available for Alabama, similar changes have occurred within the state.

While life expectancies have increased greatly over the last eighty-five years, death has only been postponed — not eliminated. The loss of a spouse or loved one is of serious consequence at any age, but especially so for the elderly. Medical and burial expenses may deplete desperately needed financial resources and the loss of companionship at a time when social relationships have already been curtailed can be especially traumatic. Furthermore, the death of a spouse may have adverse effects on one's own life expectancy. Married persons not only report fewer physiological ailments and psychological problems than those unmarried, but are characterized by longer life expectancies as well.[35]

How many more years, on the average, can an elderly person expect to live? The answer is dependent on a number of considerations, but especially age and sex. Obviously, as a person grows older fewer years of life remain. The average male who turned sixty in 1980, for example, could look forward to living another seventeen years. A male who became eighty-five during that same year, however, could expect to live only five more years (Table 16).

Females, furthermore, can expect to live a greater number of additional years than males who are also of the same age. The typical female who retired in 1980 (at age sixty-five) could expect to live another eighteen years, but a male at that same age could anticipate living only fourteen more years. Table 16 also indicates that the average number of years remaining is steadily increasing. Between 1970 and 1990, males reaching age sixty are projected to add 2.4 years to their lives, while the increment for females is anticipated to be 2.8.

These data further document two patterns that were noted earlier: (1) the differential life expectancies between the sexes; and (2) the aging of the elderly population itself. Although the data reported in Table 16 are for the U.S. population, the available information indicates that life expectancies for Alabama residents do not vary significantly from national averages.

Summary/Prospects For The Future

The effects of major demographic change are usually not inconsequential or short lived. Manifested over a period of decades, or even generations, population shifts in earlier years may have considerable relevance for the future. The effects of these changes, furthermore, are often cumulative, growing in magnitude with the passage of time until the impact extends throughout the entire society. The westward movement of the U.S. population, migration from the nation's rural areas to its cities and metropolitan complexes, and the elevated fertility levels that prevailed during the late 1940s until the early 1960s are all examples of this phenomenon.

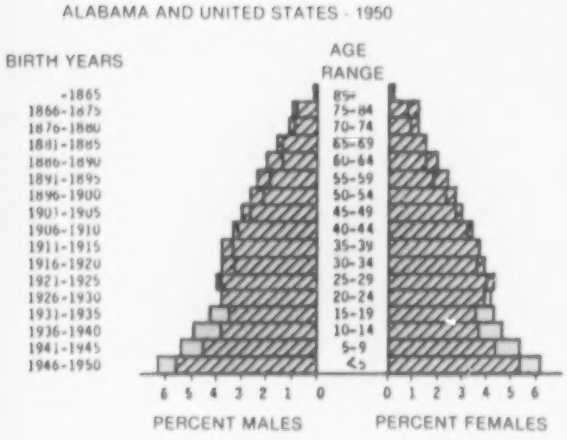
To the above events, one must also add the aging of the population. Tracing to better than a 50.0 percent increase in average life expectancy since the turn of the century, the elderly segment of the population has experienced unprecedented growth. Accounting for only 3.0 percent of the state's total population in 1900, the proportion 65 plus grew to 11.3 in 1980 and is estimated to be 11.8 at present (1985). Thousands of additional persons have entered the older age groups in recent years. So many, in fact, that in 1980 there were only about 71,000 fewer elderly persons in the state's population than teenagers.

The growth which has occurred thus far, however, represents only the beginning. Eventually, the large number of persons presently in their 20s and 30s (the so-called "baby boom generation") will join the ranks of the elderly swelling their numbers even more (see Figure 4). In 1990, well before the large age cohorts of the 1940s, the 1950s, and early 1960s reach retirement, the elderly as a percentage of the total U.S. popula-

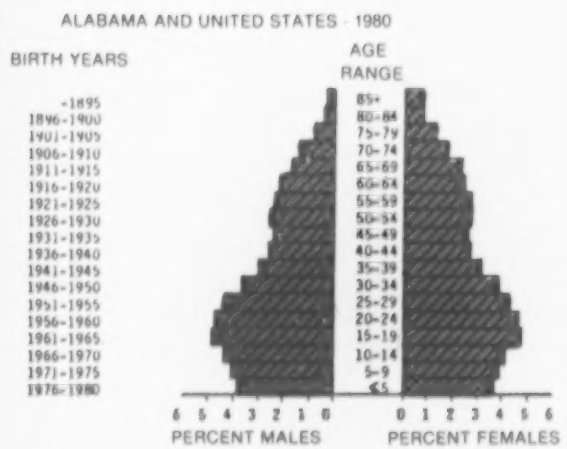
tion will have already climbed to 12.7. It will reach 13.0 percent by the year 2,000, held in check only by the low birth rates during the depression years. By 2,020, as increased numbers from the baby boom generation attain the status of "elderly," projections indicate that 51,000,000 persons in the U.S. will be 65 plus — up from 29,000,000 at present, and amounting to nearly one-fifth of the total population. In excess of 7,000,000 Americans will be aged 85 plus, along with an estimated 361,000 centenarians. In addition, the average age, for the first time in the nation's history, is projected to be in excess of forty.[38] Although comparable data are not available for Alabama, similar trends can be expected to occur within the state.

FIGURE 4

AGE STRUCTURE OF THE ALABAMA AND U.S. POPULATION, 1950 and 1980



ALABAMA		UNITED STATES	
MALES	FEMALES	MALES	FEMALES
1,582,640	1,559,103	75,186,606	76,139,192
0.1	0.2	0.1	0.2
0.8	0.8	1.0	1.2
0.9	0.9	1.1	1.2
1.4	1.5	1.6	1.7
1.4	1.5	2.0	2.0
1.8	1.8	2.4	2.4
2.1	2.3	2.7	2.7
2.6	2.7	3.0	3.0
3.1	3.2	3.4	3.4
3.4	3.7	3.7	3.8
3.3	3.6	3.7	3.9
3.7	4.0	4.0	4.2
3.7	4.2	3.7	3.9
4.3	4.4	3.5	3.5
4.9	4.7	3.8	3.6
5.4	5.3	4.5	4.3
6.3	6.1	5.5	5.3



ALABAMA		UNITED STATES	
MALES	FEMALES	MALES	FEMALES
1,871,534	2,022,354	110,053,161	116,492,644
0.3	0.6	0.3	0.7
0.4	0.8	0.4	0.8
0.8	1.3	0.8	1.3
1.3	1.8	1.3	1.7
1.7	2.3	1.7	2.2
2.0	2.4	2.1	2.4
2.3	2.6	2.4	2.7
2.4	2.7	2.5	2.7
2.4	2.6	2.4	2.5
2.5	2.7	2.5	2.6
2.9	3.0	3.0	3.1
3.6	3.7	3.8	3.9
4.0	4.1	4.3	4.3
4.6	4.7	4.7	4.7
4.9	4.8	4.7	4.6
4.3	4.1	4.1	3.9
4.1	3.9	3.8	3.6
3.9	3.8	3.7	3.5

The age-sex pyramids presented above document the passage of the "baby boom" generation through the various life stages. Now in their 20s and 30s, they will eventually attain the status of "elderly" -- noticeably swelling the apex of the pyramid.

Sources: U.S. Bureau of the Census, 1980 Census of Population, PC80-1-B1, Table 45 and PC80-1-B2, Table 20.

Once major population trends are set in motion, there is little that can be done to impede the momentum. Adjustments, therefore, must be made to accommodate the long-term changes brought about by the demographic event in question. The aging of the population, a process having great impact on all segments of Alabama's citizenry, is ***not*** a temporary aberration of the age structure. Approximately 3,000 Alabamians currently achieve the status of "elderly" each month, and their numbers will greatly multiply in the years ahead.[37] At a time when present services to the state's older citizens have either been curtailed or are barely keeping pace, it is imperative that thoughtful consideration be given to the unparalleled influx of newcomers that will shortly enter the elderly age group. Day care centers, additional nursing home space, domiciliary care units, multipurpose senior centers, expanded social services, and innovative program development will all be needed. In addition, specialized housing and transportation modes, and more personnel with training in geriatrics for employment in medical, social work, and recreational settings will be required. Adding to the uncertainty of whether such needs can be met is the recent passage of the Gramm-Rudman Act. While the effects of this legislation are largely unknown at this writing, it is anticipated that there will be substantial impact on public sector programs for the elderly.

There is a tendency to postpone serious consideration of population-related matters until well after the optimum time has passed for deliberative planning and constructive action. The unique problems associated with a rapidly aging population, however, are so pervasive and of such complexity that they cannot be easily ignored. Local communities, various levels of government, business, and education — in short, all of the state's major institutions and planning organizations — must act judiciously and in a timely manner if this important challenge of the future is to be adequately met.

Footnotes/References

1. For a more detailed discussion of the implications accompanying rapid growth among the elderly, see: American Public Welfare Association, "Coming Population Changes Bode Good and Ill for Human Services," *Washington Report*, Vol. 18, No. 8 (October, 1983).
2. Estimates prepared by the Center for Demographic and Cultural Research, Auburn University at Montgomery.
3. *Ibid.*
4. U. S. Bureau of the Census, *1980 Census of Population*, PC80-1-B1, Table 45; and U. S. Bureau of the Census, "Projections of the Population of the United States, By Age, Sex, and Race: 1983 to 2080," *Current Population Reports*, Series P-25, No. 952 (Washington, D.C.: U.S. Government Printing Office, 1984), pp. 53-54.
5. U. S. Bureau of Census, "State Population Estimates, By Age and Components of Change: 1980 to 1984," *Current Population Reports*, Series P-25, No. 970 (Washington, D.C.: U. S. Government Printing Office, 1985), pp. 7 and 9; and U.S. Bureau of the Census, *1980 Census of Population*, PC80-1-B2, Table 19.
6. U.S. Bureau of the Census, *1970 Census of Population*, PC(1)-B2, Table 20; and U. S. Bureau of the Census, *1980 Census of Population, PC80-1-B2, Table 19*.
7. U. S. Bureau of the Census, *1980 Census of Population*, PC80-1-B2, Table 17.
8. Center for Demographic and Cultural Research, Auburn University at Montgomery.
9. The urban population may generally be defined as "all persons living in places of 2,500 or more inhabitants." For a more detailed examination, see U.S. Bureau of the Census, *1980 Census of Population*, PC80-1-A2, Appendix A, p.2.
10. U. S. Bureau of the Census, *1980 Census of Population*, PC80-1-B2, Table 25.
11. U. S. Bureau of the Census, *1980 Census of Population*, PC80-1-D2, Table 205.
12. Estimated life expectancies were prepared by the Center for Demographic and Cultural Research, Auburn University at Montgomery.
13. U. S. Bureau of the Census, *1980 Census of Population*, PC80-1-D2, Table 205; and U.S. Bureau of the Census, *1970 Census of Population*, PC(1)D2, Table 152.
14. Data supplied by the Alabama Department of Public Health, Bureau of Vital Statistics.

15. U. S. Bureau of the Census, *1980 Census of Population,* PC80-1-D2, Table 205.
16. U. S. Bureau of the Census, *1970 Census of Population,* PC(1)-D2, Tables 24 and 154; and U. S. Bureau of the Census,*1980 Census of Population,* PC80-1-D2, Table 207.
17. U. S. Bureau of the Census, *1980 Census of Population,* PC80-1-D2, Table 207.
18. U. S. Bureau of the Census, *1980 Census of Housing,* HC80-1-B2, Table 61.
19. U. S. Bureau of the Census, *1970 Census of Population,* PC(1)-C2, Tables 43 and 46; and U.S. Bureau of the Census, *1980 Census of Population,* PC80-1-C-2, Table 66.
20. U. S. Bureau of the Census, *1980 Census of Population,* PC80-1-D2, Table 203.
21. U. S. Bureau of the Census, *1980 Census of Population,* PC80-1-C2, Table 71.
22. U.S. Bureau of the Census, *Statistical Abstract of the United States: 1985* (Washington, D.C.: U.S. Government Printing Office, 1984), p. 475.
23. U. S. Bureau of the Census, *1970 Census of Population,* PC(1)-D2, Table 198; and U. S. Bureau of the Census, *1980 Census of Population,* PC80-1-D2, Table 238.
24. U. S. Bureau of the Census, *1980 Census of Population,* PC80-1-C2, Appendix B, p. 22.
25. U. S. Bureau of the Census, *1970 Census of Population,* PC(1)-C2, Appendix B, p. 30.
26. U. S. Bureau of the Census, *1980 Census of Population,* PC80-1-C2, Appendix B, p. 23.
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37. From data prepared by the Center for Demographic and Cultural Research, Auburn University at Montgomery.

Center for Demographic and Cultural Research

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The purpose of the Center is to periodically provide Alabama citizens with descriptive, interpretive reports and other types of information concerning various facets of the state's population. The initial publication of the Center, entitled *Two Decades of Change in Alabama's Population: 1960-1970 and 1970-1980,* was released in March, 1983. Other publications include the *Alabama Population Data Sheet* (1983 edition); *Montgomery's Changing Population: Growth Patterns During the 1970s and Early 1980s,* published in December, 1984; and the *Alabama Population Data Sheet* (1985 edition). Additional copies of the present publication, (free of charge in limited quantity), may be obtained by writing the Director, Center for Demographic and Cultural Research, Auburn University at Montgomery, Montgomery, Alabama 36193.

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